

THE DIFFUSION OF
THE COMMUNITY LODGE

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ROBERT N. HARRIS, JR.
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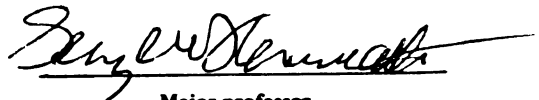
The Diffusion of the Community Lodge

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Robert N. Harris, Jr.

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## ABSTRACT

### THE DIFFUSION OF THE COMMUNITY LODGE

By

Robert N. Harris, Jr.

This study investigated the diffusion throughout the U.S. mental health system of an innovation in the treatment of chronically hospitalized mental patients. This innovation, the community lodge, was developed by George W. Fairweather and his co-workers. Previous experimental efforts had shown the need for the lodge, the efficacy of it and the variables important in implementation of such a program. The present study is the logical extension of those research efforts.

The following hypotheses were derived from the theoretical positions of four social change models; the research, development and diffusion perspective, the problem-solver perspective, the social-interaction perspective and experimental social innovation.

There is a significant positive relationship between progress towards adoption of the lodge and:

1. the existence of specialized roles for the input of new programs,

Robert N. Harris, Jr.

2. the hospital's goals of seeking information about new programs,
3. change in leadership in the hospital,
4. the occurrence of a crisis in the hospital,
5. a broad pattern of decision-making in the hospital,
6. a "change orientation" in the hospital,
7. a "systemic" perspective in the hospital.

There is a significant negative relationship between progress towards adoption of the lodge and:

8. "local pride" expressed by the hospital.

Measures of each of the variables to test these hypotheses were based upon telephone questionnaire responses gained from 244 State and V.A. hospitals throughout the U.S. These included 102 hospitals which had previously indicated no willingness to adopt the lodge (NO/NO hospitals), 117 hospitals which had previously indicated a willingness to receive a brochure, attend a workshop or develop a demonstration ward, but would not volunteer to implement the lodge (YES/NO hospitals), and 25 hospitals which previously indicated a willingness to implement the lodge (volunteers). Two other sources were also used: background data from the previous hospital implementation study and demographic information available from the American Hospital Association journal, Hospitals. Taken together, the variables measured the diffusion of the lodge, hypothesis-testing information and innovative program descriptions.

The results reveal little diffusion of the lodge in the NO/NO and YES/NO hospitals with significantly greater diffusion occurring in the original volunteers. This is

derived from the chi-square comparing differences among hospitals on degree of adoption of the lodge, which is significant beyond the .001 level. This finding is the most salient of the present study. Apparently diffusion must, in fact, be planned. Those hospitals which had been most active previously (in YES/NO and volunteer hospitals) did, in fact, diffuse more.

This comparative analysis led to the use of three separate cluster analyses to test the hypotheses. The results of the preset cluster analyses did not support a single hypothesis as contributing to the diffusion of the lodge. There was some indication of the importance of a broad pattern of decision-making in the volunteer hospitals.

Other results indicate that diffusion is unrelated to other domains except in the NO/NO hospitals. This indicates that with no intervention, diffusion is related to adoptiveness-innovativeness, expenses and superintendent influence, but that the intervention attempt itself alters other relationships which may exist without it. In addition, the cluster analysis of the volunteer hospitals reveals several interesting findings. The specialized roles for input of new programs is related to stability, not adoption of new programs. Such adoption seems to occur in those hospitals which place new program responsibility in less well-established hands.

Generally, the results of both comparative and correlative analyses reveal the following findings:

1. More active implementation attempts lead to greater diffusion of the lodge.
2. Diffusion of a complex social innovation is relatively unrelated to other organizational, attitudinal and demographic variables, and therefore;
3. There is little correlative evidence to support any of the eight hypotheses.

Several limitations of the present study were discussed. These included the lack of diffusion of a complex social change and its effect on our analyses, telephone rather than face-to-face interviewing techniques employed and the limited N size in the volunteer hospitals.

Finally, recommendations for future research were made. These included researches to investigate methodological questions, differences between different types of innovations, the importance of an active change agent and the possibility of developing diffusion centers.



THE DIFFUSION OF THE COMMUNITY LODGE

By

Robert N. Harris, Jr.

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## CHAPTER I

### INTRODUCTION

This study investigates the diffusion throughout the U.S. mental health system of an innovation in the treatment of chronically hospitalized mental patients. George W. Fairweather and his co-workers developed the community lodge program for these patients after years of research and evaluation of both traditional and innovative treatment programs (Fairweather, et al., 1960; Fairweather, 1964, 1967; Fairweather, et al., 1969). The empirical evidence reported in Community Life for the Mentally Ill (Fairweather, Sanders, Cressler and Maynard, 1969) indicated that the lodge program deserved further efforts at implementation. These efforts were recently completed and will be reported in Changing Mental Hospitals (Fairweather, Sanders and Tornatzky, 1972). The present investigation is a logical extension of previous research efforts, and will examine the effects of planned and unplanned social change. To place this study in perspective, however, it is necessary to explore the diffusion process and its relationship to different social change models.

## Social Change Models

In Planning for Innovation through Dissemination and Utilization of Knowledge, Havelock (1971) provides three conceptual frameworks for diffusion research. In his comprehensive review of nearly four thousand studies, Havelock develops three models of dissemination and utilization (D&U)<sup>1</sup>; the research, development and diffusion perspective (R,D&D), the problem-solver perspective (P-S), and the social-interaction perspective (S-I). The research approach created by Fairweather (1967) and followed by empirical research in 1969 and 1972 enhance these models by developing a fourth model, Experimental Social Innovation (E.S.I.), which incorporates concepts from these three approaches and places them in an experimental perspective.

### The Research, Development and Diffusion Perspective (R,D&D)

Guba (1966) developed a typical model for this perspective. The phases described by Guba (1966) and Guba and Clark (cited in Havelock, 1971) include research, development, diffusion and adoption. Of the three models of dissemination and utilization, the R,D&D model views

---

<sup>1</sup>Dissemination and utilization is viewed as the "transfer of messages by various media between resource systems and users." (Havelock, 1971).

the process of change from the earliest point in time, research. Research "may provide a basis for innovation if anyone else is clever enough to develop an application from it." (Guba, cited in Havelock, 1971.)

Development includes invention and design (Guba, 1966), engineering and manufacturing (Havelock and Benne, 1967), or design and evaluation (Brickell, in Miles, 1964). It is development "which is at the heart of change." (Guba, 1966.)

For Guba, diffusion includes both dissemination and demonstration. These activities "create widespread awareness of the invention among practitioners." (Guba, 1966.)

Finally adoption includes trial, installation and institutionalization. The objective at this stage is the "incorporation of the invention into a functioning system." (Havelock, 1971.) The R,D&D model, then, views change from an early point in time, and from the view of the originator and developer. These considerations, in particular, distinguish this model from the next two.

### The Problem-Solver Perspective (P-S)

This model is based on the early work of Lewin (1951) who refers to three major stages of change, un-freezing, moving and freezing. Lippitt, Watson and

Westley (1958) expanded this basic model to include developing the need for change, establishing a change relationship, diagnosis of client problems, establishing goals of action, transforming intention into actual change, generalizing and stabilizing the change and achieving a terminal relationship. Other authors concerned with this basic model include Mann and Williams (1960), Thelen, (in Watson, ed., 1967) and Miles and Lake (in Watson, ed., 1967).

In the P-S model the receiver initiates the process of change by identifying a need. He actively searches for the innovation to solve his problem. Actual change usually involves outside assistance in implementing the change. As such, the P-S model is similar to the developmental aspect of the R,D&D model.

### The Social-Interaction Perspective (S-I)

Rogers (1962, 1971) is most closely associated with this perspective. The focus of his model is on channels of communication within the receiver group and with the stages through which individuals pass as they make progress towards adoption of innovations. These stages are knowledge, persuasion, decision and confirmation. Other authors concerned with this basic model are Wilkening (1962), Beal, Rogers and Bohlen (1957) in agriculture, and Coleman, et al. (1966) in medical innovation.

This model was derived largely from cases of "unplanned changes," whose development is characterized by the stages described above. Rogers (1962) cites several studies which support his concept of stages. In this manner, the S-I model assumes that both research and development have occurred, and that the major concern is for the spread of the innovation. Since the present study emphasizes the diffusion of a mental health innovation, this model will be of great significance to this paper.

#### Experimental Social Innovation (E.S.I.)

We have examined three models of dissemination and utilization research. A fourth model is now being developed which places the processes of innovation and implementation in an experimental framework. Historically, survey research has most often been used as the basis for describing and conceptualizing different models of D&U. Fairweather (1967, 1972), in developing Experimental Social Innovation specifies the processes of innovation and implementation in conceptual stages that can be subjected to experimental techniques. Its common elements are model-building, evaluation, implementation and diffusion; all in an experimental framework. The relationship between these four models is indicated in Table 1.

Table 1. Experimental Social Innovation and the Models of Dissemination and Utilization.

| Models of Dissemination and Utilization              |                                                                                                                                    |                                                                 |                                                                                                                                                                               |
|------------------------------------------------------|------------------------------------------------------------------------------------------------------------------------------------|-----------------------------------------------------------------|-------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| Research,<br>Development<br>and Diffusion<br>(R,D&D) | Problem-<br>Solver<br>(P-S)                                                                                                        | Social-<br>Interaction<br>(S-I)                                 | Experimental<br>Social<br>Innovation<br>(E.S.I.)                                                                                                                              |
| Research                                             | Research<br><br>Assumed                                                                                                            | Research<br><br>Assumed                                         | Experimental<br>Model-Building<br>and Evaluation<br><br>Definition<br>Naturalism<br>Innovation<br>Comparison<br>Context<br>Evaluation<br>Responsibility<br>Cross-disciplinary |
| Development                                          | Need for<br>change<br><br>Establish<br>relationship<br><br>Examine goals<br>Select<br>alternatives<br><br>Plan implemen-<br>tation | Development<br><br>Assumed                                      | Experimental<br>Implementation<br><br>Approach<br><br>Persuasion<br><br>(Adoption)                                                                                            |
| (Adoption)                                           | Installation<br><br>Terminate re-<br>lationship                                                                                    |                                                                 |                                                                                                                                                                               |
| Diffusion-<br>(Adoption)                             | Diffusion                                                                                                                          | Knowledge<br><br>Persuasion<br><br>Decision<br><br>Confirmation | Diffusion<br><br>(Adoption)<br><br>May include:<br>approaching<br>persuading                                                                                                  |

## A Functional Description of E.S.I.

### Background - From Traditional to Innovative Treatment of Mental Patients

The innovative model presented in this study was developed against the background of many periods of change in the treatment of mental patients. Nicholas Hobbs (1969) cites three periods of change so radical that each is referred to as a mental health revolution. The first revolution is identified with Phillippe Pinel, William Tuke, Benjamin Rush and Dorothea Dix. These zealous reformers insisted that insane people be treated with kindness, rather than beatings. But in spite of their good intentions, the "cumulative effects of industrialization, massive urbanization, ... weakening of traditional family and local community ties...and many other social changes, led to a construction boom in large, congregate, custodial institutions in France, England and the United States." (Pasamanick, et al., 1967.) In these institutions "treatment" was custodial, rehabilitation non-existent and isolation from the outside world of prime concern. Such institutions give sound historical bases to the popular conceptions of mental health treatment models as forwarded by Goffman (1962), Kesey (1962) and others.

The second revolution found its leader and innovator in Sigmund Freud and his preoccupation with the intrapsychic life of man. Freud's disciples made individual



psychoanalytic treatment the preferred approach to both chronic schizophrenics and middle class housewives. This innovative approach spread throughout the world and continues to appeal to much of the mental health establishment. Such appeal grows despite numerous outcome studies which reveal little or no improvement due to psychotherapy (Eysenck, 1966).

The "psychotherapeutic" revolution found itself subject to experimental work. In order to experimentally investigate the effects of such a model of treatment, Fairweather began a series of evaluative studies in 1955. The results of the first study,

. . . showed that patients who participated in the three most common hospital treatment programs (models) [(1) individual psychotherapy, (2) group psychotherapy, and (3) living and working together as groups] do no better or worse in community adjustment 18 months after release from the hospital than those patients who had simply worked in the hospital setting (a fourth model).

Fairweather, unpublished  
manuscript, 1972

In 1958 the traditional ward was further compared to a small group ward (another new model) in which patients were organized into problem solving groups. The findings indicated that such small groups could be formed and that autonomy and morale were enhanced. But patients still returned to the hospital as quickly as the more traditionally treated patients (Fairweather, 1964).

The next model developed, the lodge, corresponds to the third revolution cited by Hobbs. In the third revolution, psychiatry "has shifted the major emphasis in mental health care out of the institution and back to the community." (Pasamanick, et al., 1967.) The community focus pervades recent innovative attempts in treating mental patients. These include half-way houses, foster care homes, independent living units, "enabler" programs, Home Care Projects (Pasamanick, et al., 1967), Community Lodges (Fairweather, et al., 1969), etc. Such programs vary in the degree to which patients are autonomous, but all share the locus of the community.

#### Creating and Evaluating a New Model - The Community Lodge

The transition of mental health programs from the hospital to the community requires the patient to be prepared for a new environment. The subordinate social status enforced in the hospital does not prepare the patient for his new situation. "Patients are administered to by the physician and professional staff, and their expectations are organized around this lowly position."

(Fairweather, et al., 1969.) Many "innovative" after-care programs retain such marginal status as part of the community treatment. The patient is seen as a child, guided by house parents or foster parents. He is not allowed to develop as a first-class citizen until release and "cure."

In an attempt to develop first-class citizenship for the mental patient in a community setting, and to provide that person situational support, employment and extended tenure in the community, Fairweather and his co-workers created a new model of treatment, the community lodge. In an earlier study, Fairweather (1964) found that community tenure was intimately related to the patient in the community enjoying a socially supportive living situation, frequent employment and employment in a low-status job. These findings led to the development of the community lodge, which is fully described in Community Life for the Mentally Ill (Fairweather, et al., 1969). Briefly, the lodge involves the training of groups of patients so that they may be prepared for full, first-class citizenship outside the hospital.

After several months of small group training in the hospital, 10-15 patients were moved into their home in the community. In the community they had no live-in staff, a patient self-governing body, free exit and entry provisions, self-medication, and a business of their own to help support themselves. This social organization resulted in feelings that the patients were worthwhile, productive citizens. Evaluation of the program concluded that such a program is not only feasible, it is better than other existing in-hospital and post-hospital treatment facilities on several key dimensions. An evaluation

comparing the lodge members to a control group of in-hospital small group ward patients with traditional after-care facilities indicated that the lodge was significantly more effective in reducing recidivism and increasing employment. In addition it was less expensive than the traditional program.

### Experimental Implementation

Subsequent attempts to get the lodge adopted locally and elsewhere revealed that presenting this research data was not sufficient to influence hospitals to accept the program. Therefore, Fairweather and his co-workers decided to attempt to nationwide experimental implementation of the lodge program. Two hundred and fifty-five State and V.A. hospitals in the U.S. (virtually the entire population) were contacted about the lodge program. Several experimental conditions were evaluated. They were:

1. Method of presentation (brochure, workshop, development of a demonstration ward)
2. Status of initial contact (superintendent, psychiatry, psychology, social work, nursing)
3. State or V.A. hospital
4. Urban or rural hospital

For the hospitals which volunteered to implement the lodge after initial persuasion attempts, a further

condition was tested. This involved the difference between active, consultant help and written, manual help in developing the lodge.

Preliminary analyses reveal that method of approach presentation, implementation condition (written vs. action) and certain group process measures in the hospitals distinguish between hospitals which volunteer for and implement the lodge and those which refuse the attempts. Thus far it appears that the most active approaches are the most successful. A detailed analysis of this study will appear in a forthcoming volume (Fairweather, Sanders and Tornatzky, 1972).

#### An E.S.I. Diffusion Study

This background information was necessary to understand clearly the study that constitutes the main concern of this paper. It is specifically concerned with the diffusion of the lodge program, i.e., what happened after implementation. Of the original 255 hospitals, only 25 formally volunteered to implement the lodge. There are therefore a population of 230 hospitals which were not subjected to implementation attempts by the research team. Some of these hospitals received a brochure, others attended a workshop, and still others set up a demonstration ward, but none of the 230 were part of any further planned implementation.

This condition raises several questions that need to be answered. Have the unconvinced hospitals adopted the lodge anyway? What kinds of programs have these hospitals been adopting since the last contact with them? Have the 25 volunteer hospitals diffused the lodge concept? What organizational and attitudinal variables are important in the spread of this innovation? This study tries to answer these and other questions.

### Basic Concepts of Diffusion

Discussion of diffusion is in each social change model described in Table 1. Now let us review the concepts of diffusion and adoption.

Diffusion is the "process by which an innovation spreads among members of a social system." (Rogers, 1971.) An innovation is an idea, practice or object perceived as new by the adopting population. For example, humane treatment of patients and individual psychotherapy were innovations at one time, and have since spread through the mental health system.

The social system may be defined as any "collectivity of individuals, or units, who are functionally differentiated and engaged in collective problem-solving with respect to a common goal." (Rogers, 1971.) Thus, we may be referring to farmers in Iowa (Ryan and Gross, 1943), medical doctors in a large city (Coleman, Katz

and Menzel, 1966) or mental hospitals throughout the U.S. As will be noted later, careful consideration of the social system being examined and the units which define the system are essential parts of any diffusion research.

Diffusion and a highly related concept, adoption, are best differentiated through the use of diffusion and adoption curves. The diffusion curve indicates the rate of adoption of an innovation by the adopting group in the social system. Graphically, Rogers (1971) and Havelock (1971) present this curve as follows:

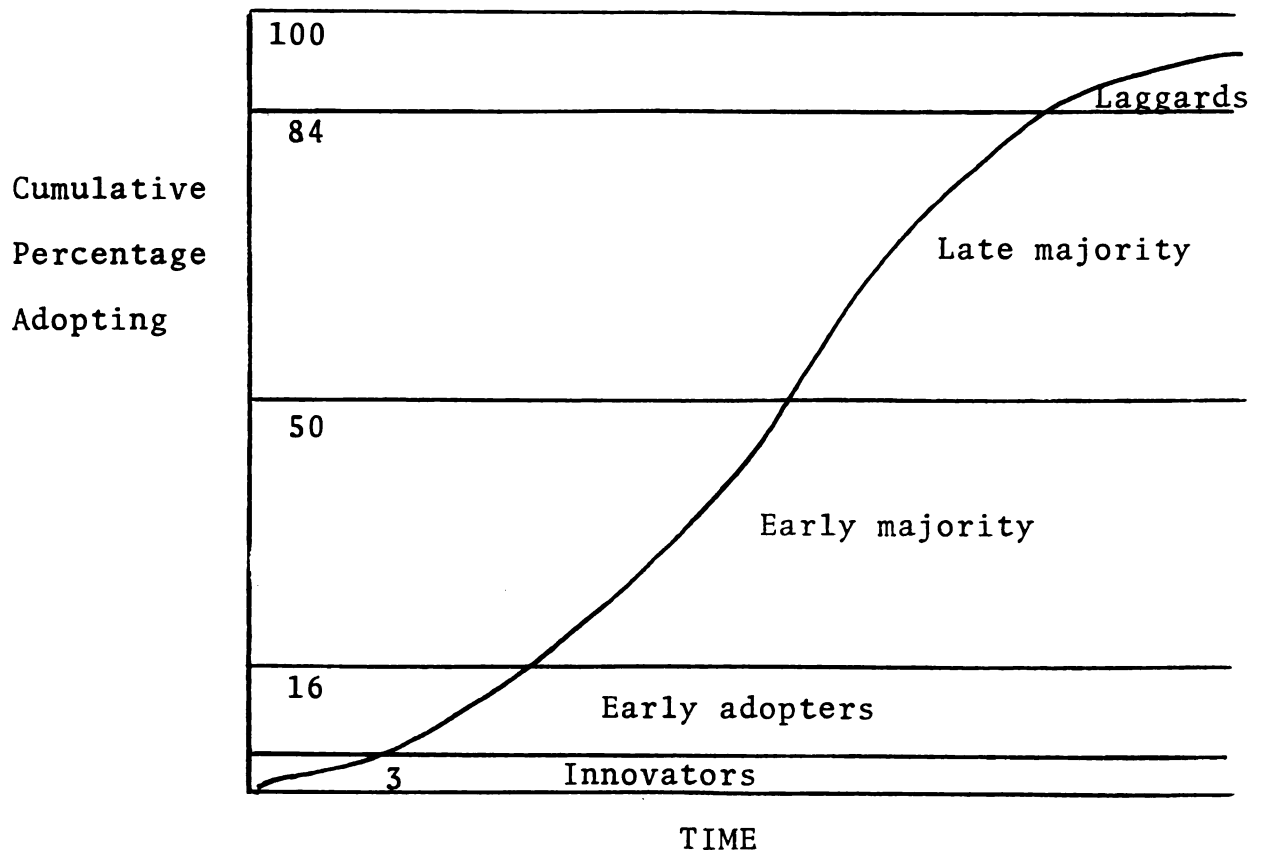


Figure 1. The Diffusion Curve (Havelock, 1971).

This indicates that it is possible to categorize groups of adopters in terms of their rate of adoption. Innovators comprise the first 3% to adopt the innovation. When 50% of the population has adopted, early majority adopters are included. Until nearly total adoption, however, it is difficult to categorize individuals in this manner.

One possibility for categorizing individuals prior to total adoption is with an adopter curve. This represents the activity of an individual (or individual unit) as he adopts the innovation. We return to Havelock (1971) for one possible interpretation of the adoption curve:

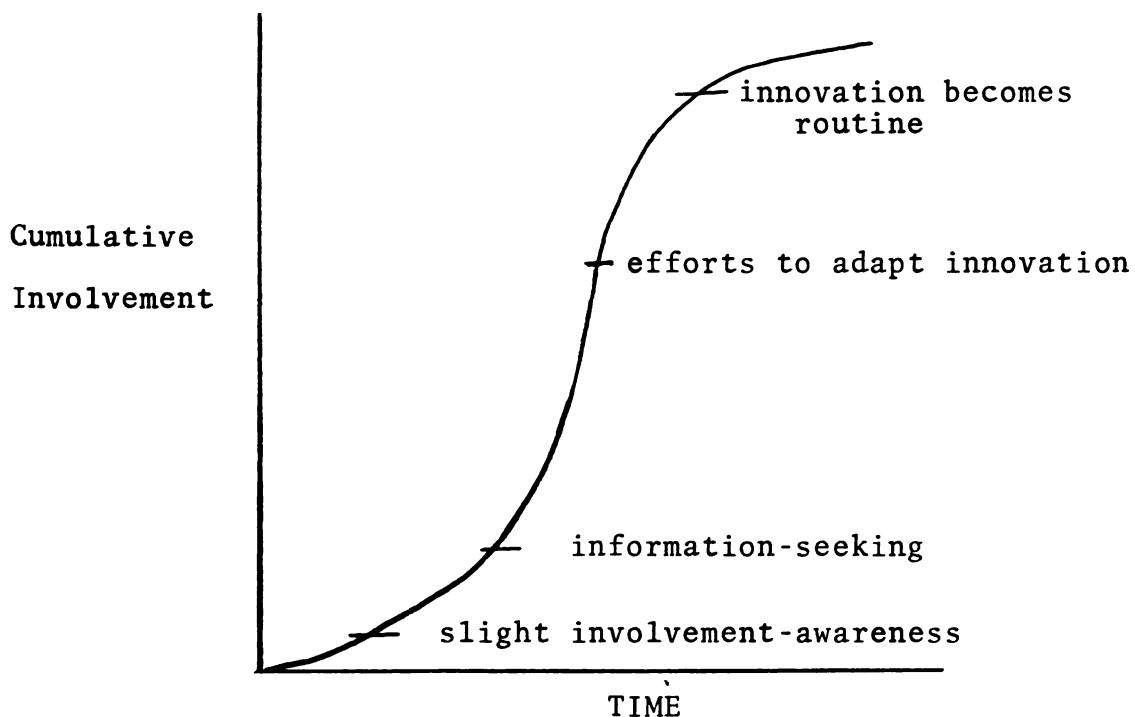


Figure 2. The Adoption Curve (Havelock, 1971).



Rogers (1971) modifies this adoption curve and his adaptation of it will serve as a basis for investigating the diffusion and adoption of the community lodge.

Havelock (1971) and others discuss many characteristics of the receivers of innovation which influence their facility for adopting innovations. Past diffusion research examines three general elements: individual, interpersonal, and organizational. Organizational elements will be investigated in the present study. These elements are traditionally divided into three categories: input (entering information), throughput (internal processing) and output (exiting information) (Havelock, 1971). Each element is important in the diffusion of an innovation. In order to examine the relationship between the diffusion of the lodge and certain organizational (hospital) characteristics, the present study was designed to test the following hypotheses.

### Hypotheses

#### Hypothesis 1.

Havelock (1971) and Katz and Kahn (1966) discuss specialized knowledge-seeking subunits whose aim is to seek out and collect new knowledge. Knoerr (1963) cites the example of library funds as important in facilitating the input of new knowledge. Others mention information retrieval systems (Veyette, 1962), planning units or

research and development units. Katz and Kahn (1966) stress the importance of such subunits having their own staff, having leaders with high status and having them report directly to the top of the organization. Therefore, we hypothesize that there is a significant positive relationship between the existence of specialized roles for input of new programs and degree of progress towards adoption of the lodge.

#### Hypothesis 2.

Havelock (1971) and Katz and Kahn (1966) discuss goals and rewards as they relate to information seeking. Rogers uses similar concepts in discussing "relative advantage." (Rogers, 1962, 1971.) An organization which sees innovation and input of new knowledge as a part of its goal orientation, will operationalize such an orientation with rewards for innovative ideas, evaluations based upon innovativeness and public statements of knowledge-seeking goals. It follows that such an orientation would lead to greater progress towards adoption of the lodge innovation. Therefore, we hypothesize that there is a significant positive relationship between a hospital's goals of seeking information about new programs and degree of progress towards adoption of the lodge.

### Hypothesis 3.

Griffiths (in Miles, 1964) proposes a theory of innovation based upon change in leadership in an organization. His propositions include: 1) The number of innovations is inversely proportional to the tenure of the chief administrator; 2) Change in an organization is more probable if the successor to the chief administrator is from outside the organization, than if he is from inside the organization.

Carlson (1962, 1965) has investigated change with respect to school systems and the superintendents of schools. He concludes that school superintendents "look upon a long tenure in office as detrimental to the school systems."

(Carlson, 1965.) Change in superintendents is necessary, and the most beneficial is when the new leader comes from outside the system. "The outsider's performance changes the office and relations of others to the office . . . (he has) the tendency to change the district." (Carlson, 1965.) In fact, if the new superintendent has moved from community to community, he has "placed himself in a group dedicated to change, reform and improvement." (Carlson, 1965.) Belknap (1956) came to a similar conclusion regarding mental hospital superintendents.

Finally Marrow et al. (1967) describe the complete change in leadership of an organization and cite the resulting infusion of new ideas. In addition to new ideas

at the top of the organization, the rest of the employees were psychologically better prepared for changes which followed.

Therefore, we hypothesize that there is a significant positive relationship between change in leadership and amount of progress towards adoption of the lodge.

#### Hypothesis 4.

In our brief discussion of the problem-solver perspective, it was mentioned that the organization must feel discomfort before new knowledge will be utilized (Lippitt, Watson and Westly, 1958; Lewin, 1951; Schein and Bennis, 1965). Schon (1967) states that "something like a state of crisis must arise . . . Once it perceives the threat, the organization must immediately interpret it as requiring a shift toward innovation." (p. 127) Watson (1966) indicates that innovation is resisted if things are going smoothly. Finally, Michael (1965, in Havelock, 1971) proposes that social disaster often facilitates innovation.

Therefore, we hypothesize that there is a significant positive relationship between occurrence of a crisis in the hospital and amount of progress towards adoption of the lodge.

## Hypothesis 5.

Fairweather, Sanders and Tornatzky (1972) found that several indices of broad decision-making participation were consistent factors important in change related to the lodge during the approach-persuasion and implementation phases. Change was related to a greater number of staff involved in the decision to implement the lodge, and a greater satisfaction with that decision. In addition, Griffiths, (in Miles, 1964) concludes that the more hierarchical the structure of an organization, the less the possibility of change. We hypothesize that there is a significant positive relationship between a broad pattern of decision-making in the hospital and amount of progress towards adoption of the lodge.

## Hypothesis 6.

Organizations which feel that their programs are better than other hospitals, and are proud of the progress their institution has made will be less likely to accept outside innovations than those which are dissatisfied. Havelock (1971) cites two studies which support this conclusion, Allen (1966) and President's Conference on Technical-Distribution Research (1957). We hypothesize that there is a significant negative relationship between "local pride" expressed by a hospital and progress towards adoption of the lodge.

## Hypothesis 7.

If a hospital in general feels strongly about the value of change, and if the superintendent, in particular, feels that innovation is good and part of his job, then the lodge should diffuse more in that institution. As an attempt to look at the general "zeitgeist" of the hospital as it relates to a specific change, we hypothesize that there is a significant positive relationship between "change orientation" in the hospital and amount of progress towards adoption of the lodge.

## Hypothesis 8.

Katz and Kahn (1966) have developed the theoretical notion of "systemic perspective." "Systemic research" involves the search for new information and a concern for the functioning of the organization in relation to its environment. It is governed by the optimizing principle, i.e., seeking not the minimally accepted answer, but rather the optimal answer. The lodge has been presented as the optimal answer to mental health care, and it is concerned with the hospital's relationship to environment outside the institution. In addition, leaders with a systemic perspective are seen as willing to originate structure and to "change in response to external demands for change." (Katz and Kahn, 1966.) We hypothesize that there is a significant

positive relationship between a "systemic" perspective  
envisioned by the administration of a hospital and pro-  
gress towards adoption of the lodge.

## CHAPTER II

### METHODS

#### Sampling Units

Two hundred and fifty-five State and V.A. hospitals for the mentally ill in the U.S. served as the sample for the present study. This is virtually the entire population of such hospitals. The sample included the following hospitals:

1. One hundred and seven hospitals who answered No to the persuasion condition and No to the implementation condition of the previous hospital implementation study (Fairweather, Sanders and Tornatzky, 1972); henceforth to be called the NO/NO hospitals.

2. One hundred and twenty-three hospitals who answered Yes to the persuasion condition and No to the implementation condition; henceforth to be called the YES/NO hospitals.

3. Twenty-five hospitals who volunteered to implement the lodge by answering Yes to the implementation decision. This includes two hospitals who answered No to the persuasion condition and



twenty-three who answered Yes; henceforth to be called the NO/YES and YES/YES hospitals, or implementation volunteers.

Of the 255 hospitals, 244 responded to the questionnaire, providing a return rate of 96 percent. Since all interviewing was completed by phone, we established a hierarchy of those to be contacted at each hospital. For each sample as described above, the interviewer preferences were as follows:

1. 107 NO/NO hospitals
  - a. Implementation decision maker
  - b. Present superintendent
2. 123 YES/NO hospitals
  - a. Implementation decision maker
  - b. Other administrative old contacts
  - c. Present superintendent
3. 25 NO/YES, YES/YES hospitals
  - a. Research team's last contact
  - b. Other administrative old contacts
  - c. Present superintendent

#### Data Collection Procedures

The measurement of the variables in this study was based on three sources of information: a phone questionnaire, data from the previous hospital implementation study, and demographic information available

from the American Hospital Association journal, Hospitals. The specific items of the questionnaire designed to measure each variable are presented in Appendices B and C.

This survey was conducted by telephone for several reasons. Expense ruled out site visits to all 255 hospitals. Written questionnaires have unreliable return rates, especially with a national sample. The phone contact allowed the researchers to gain a subjective "feel" for each of the institutions interviewed. Twelve questionnaires were mailed to respondents who requested it and who refused to answer by phone. Of those, two were completed and returned.

The procedure used by the interviewers was as follows. Except during the Bell Telephone employee strike which occurred midway through data gathering, phone calls were made person-to-person in order to increase the likelihood of speaking with the preferred contact. During the strike, which lasted about 10 days, calls were made station-to-station. The phone introduction used appears in Appendix A.

In all cases the first contact as listed above was requested. After this there were three possibilities:

1. He was in and answered the call

In this case the questionnaire is administered to him. If he referred us to someone else to get more or better information, contact was extended to the new

person. This was, in fact, a rare occurrence. Most contacts felt comfortable and confident in answering our questions.

2. He was still at the hospital, but unavailable at the first call

A message was left for him to call us collect (at specified hours). If contact was not completed by the second such attempt, the second person on the list was requested. This procedure was continued until contact was made, and the information obtained.

3. He was no longer at the hospital

Interviewers continued down the list as in 1. and 2.

In all cases, the status of the respondent was recorded and later investigated in the cluster analysis.

Interviewers were three graduate assistants from the Department of Psychology at Michigan State University, including this investigator. In order to assure that each presented the questionnaire from the same perspective, each interviewer was completely briefed on the lodge project and was allowed to read the files of his assigned hospitals. This gave each interviewer information necessary to administer the questionnaire including the names of past contacts, persuasion condition, superintendents' names and a feeling for the relationship between the

research team and the hospital. In many cases this prepared the interviewer for otherwise unexpected and confusing responses. Hospitals were randomly assigned to each interviewer.

Prior to actual research interviews, each interviewer made calls to several hospitals not in the sample in order to acquaint him with the phone questionnaire and naturalistic interviewing. These practice interviews were discussed in detail by the three researchers, and any misunderstandings were cleared up. In addition, the interviewers met for a brief session each day to ensure questions were being asked identically and no problems were arising. In general, interviewing went smoothly, though certain interviews required some persistence and patience on the part of the research team.

Respondents were generally cooperative, if not friendly. Even though interviews averaged about 40 minutes, there were few hostile complaints from the hospital personnel. Some offered to send program descriptions to us. Many wanted the results of the study sent to them. One interviewer was actually requested to interview for a job at the respondent hospital.

In spite of the above precautions, careful examination of the responses elicited by each interviewer led this investigator to suspect an irregularity with one interviewer. These suspicions were confirmed when chi-square

tests indicated that this one interviewer received responses significantly different from the other two interviewers on 11 of 20 variables tested. Therefore, an additional variable was inserted in the cluster analysis to test whether or not interviewer differences were related to the results obtained.

### Measurement of Variables

As stated earlier, three sources of information were used in this study: a phone questionnaire, data from the previous hospital implementation study and demographic information available from the American Hospital Association journal, Hospitals. The use of each of these is discussed below.

### Hospital Study Data

Data deemed relevant from previous research (Fairweather, Sanders, and Tornatzky, 1972) included the following items:

1. Social change score (1-3)
2. Persuasion condition (brochure, workshop, demonstration ward)
3. Persuasion volunteer (Yes, no)
4. Implementation volunteer (Yes, no)

Each of these had been scored previously and fit well into the analysis of the present study's data.

### Demographic Information

Demographic data was available from the AHA journal, Hospitals. In addition to its face value, this demographic data gave us an objective look at several of the "crises" mentioned by respondents. Crises usually involved budget or staff, and therefore an objective measure of such crises was available from the following data:

1. Total expenses 1970
2. Difference in expenses 1969-1970
3. Total number of staff 1970
4. Difference in staff 1969-1970
5. Staff/Patient ratio 1970
6. Difference in census 1969-1970

### Phone Questionnaire

The phone questionnaire was divided into three distinct sections: lodge diffusion questions, hypothesis-testing questions and innovative program descriptions. The measurement of each of these variables is discussed below.

#### Lodge Diffusion Questions

The specific items designed to measure diffusion of the lodge are presented in Appendix B. Rogers (1962, 1971) provided the basic framework for these questions. This framework was used to index the extent of lodge adoption by individual hospitals. Since few of the

hospitals had actually adopted the lodge, a score of progress towards adoption was more appropriate than a score based upon the traditional diffusion curve (see Appendix D). Questions were therefore asked in terms of Rogers' (1971) stages of adoption:

1. Knowledge
2. Persuasion
3. Decision
4. Confirmation

The resulting score (Diffu) is a measure of movement towards adoption of a lodge by each hospital since the implementation decision date. Since this was the last contact with the 230 NO/NO and YES/NO hospitals, it is also a measure of diffusion for those hospitals. It is not an uncontaminated diffusion score for the 25 implementation volunteers since it includes the time period during which implementation attempts were being made. A second score (Diffu 2) was therefore created to investigate movement towards adoption of a lodge since our last contact with the volunteer hospitals. Both of these measures are presented in detail in Appendix D. Two interviewers reached interrater reliability of .92 on Diffu and .82 on Diffu 2 (Pearson product moment correlation coefficient.)

### Hypothesis-Testing Questions

A series of questions was presented to each respondent to test the hypotheses listed above. The specific items are presented in Appendix C. Questions were designed to investigate the following concepts:

1. Type of subunit designed to search for new programs.
2. Types of activities funded by the hospital.
3. Goals expressed by the hospital.
4. Change of administration in the hospital.
5. Crisis situations in the hospital.
6. Power and type of influence in developing new programs.
7. Subjective assessment of the hospital's treatment facilities.
8. Systemic research approaches by the hospital staff.

### Innovative Program Descriptions

In an attempt to compare lodge adoption activity with a measure of general adoptiveness and innovativeness, each respondent was asked to describe treatment programs started at his hospital since our last contact with it. In general, this was since April, 1969. The 25 volunteers were asked to describe any new programs started since they had volunteered to implement the lodge. From these descriptions, and from a checklist read to



each respondent, the following new programming scores were developed:

1. Total number of new programs.
2. Number of new in-hospital programs.
3. Number of new community programs.
4. Degree of community locus exhibited by new programs.
5. Degree of autonomy for patients exhibited by new programs.

These measures are fully described in Appendices E and F. Interrater reliability was again calculated employing a Pearson product moment correlation coefficient. The results were as follows:

|                         |           |
|-------------------------|-----------|
| 1. Total new programs   | $r = .86$ |
| 2. In-hospital programs | $r = .93$ |
| 3. Community programs   | $r = .77$ |
| 4. Community locus      | $r = .87$ |
| 5. Autonomy             | $r = .98$ |
| Mean                    | $r = .88$ |

For our purposes, "program" was any organized activity or group of activities whose focus is on patients from the hospital. This would not include outpatient clinics for community patients, the "unit" system per se nor "training" for staff. Therefore, some judgement was used in deciding what would be considered a program.

### Data Analysis

The basic outcome criterion was the diffusion score (Diffu) described above which indicates the degree to which each hospital adopted the lodge since the implementation decision date of the previous hospital study (Fairweather, Sanders and Tornatzky, 1972). Since the experimental attempts to approach, persuade and implement the lodge may logically have an effect upon the degree of adoption, a chi-square test was made using the diffusion score and previous willingness to adopt the lodge concept. In this manner a comparison was made of unplanned diffusion (NO/NO hospitals), partially planned diffusion (YES/NO hospitals) and planned diffusion (YES/YES, NO/YES hospitals) on degree of adoption.

Our hypotheses predict positive relationships between degree of adoption and eight concepts tested during the study. These eight concepts were defined such that, along with some defining variables, the total number of variables investigated in this study is 90. In order to handle this amount of data, and to determine any associative relationships between degree of adoption and the other variables measured in this study, Tryon and Bailey's (1970) methods of Cluster Analysis were used. Specifically a V-Analysis was used to define the empirical clusters. A preset analysis was then employed with the diffusion score (Diffu or Diffu 2) as the key variable

in the first cluster and the definers of the empirical V-Analysis preset for succeeding clusters. Variables are included in the CC5 and CSA programs of V-Analysis which are most highly collinear with other members. In general, variables are excluded whose factor loading is below .40, and whose communality is below .20.

## CHAPTER III

### RESULTS

#### Amount of Diffusion

The amount of diffusion as measured by the degree of adoption score (Diffu) is the first concern of this chapter. Many analyses reported in this section are based upon the assumption that diffusion did in fact occur, and that this diffusion has significant relationships with groups of variables measuring the concepts cited in our hypotheses.

An analysis of the amount of diffusion is presented in a chi-square table using the diffusion score (Diffu) and nominal categories which indicate the hospital's previous willingness to adopt the lodge concept. The influence of the latter categories was not hypothesized, but such a distinction is a logical one for this analysis. We must remind the reader that Diffu is a score created to indicate the degree of adoption reached by a hospital regardless of previous experimental conditions. It is a diffusion and degree of adoption score for 219 hospitals (NO/NO and YES/NO hospitals) and only

a degree of adoption score for the 25 volunteer hospitals (YES/YES, NO/YES hospitals). Diffu 2 is the diffusion score for this latter group of hospitals (see Appendix D).

Table 2. Comparison of Amount of Diffusion Between Hospitals Indicating Differential Willingness to Adopt the Lodge in Previous Research Efforts.

| Previous Willingness to Adopt Lodge      | Amount of Diffusion (Diffu) |                   |                   |                          |                           |
|------------------------------------------|-----------------------------|-------------------|-------------------|--------------------------|---------------------------|
|                                          | Knowledge<br>(1)            | Persuasion<br>(2) | Persuasion<br>(3) | Decision-Adoption<br>(4) | Decision-Adoption<br>(5+) |
| None (NO/NO)                             | 68                          | 18                | 8                 | 6                        | 2                         |
| Permitted Persuasion Attempt (YES/NO)    | 52                          | 27                | 16                | 16                       | 6                         |
| Volunteered to Adopt Lodge (NO, YES/YES) | 0                           | 5                 | 2                 | 3                        | 15                        |

$$\chi^2 = 123.9$$

$$df = 8$$

$$p < .001$$

The most striking result is the lack of diffusion-adoption. Only 23 hospitals of the 244 investigated actually proceeded beyond discussion of the lodge concept. Of these 23, 15 were volunteers who regularly received input from the research team. The mean diffusion score

is 2.25. For the NO/NO hospitals it is 1.62; for the YES/NO hospitals it is 2.20; and for the volunteer group it is 5.08. For the latter group, eight hospitals adopted the lodge in some fashion (a "7" or "8" on Diffu) while only one hospital reached this level in the other 219 hospitals.

The chi-square computed on these scores is significant beyond the .001 level, indicating that the three groups of hospitals are significantly different with regard to degree of diffusion-adoption. In other words, degree of diffusion-adoption is related to previous implementation attempts. Because of these significant differences cluster analyses which follow have been computed independently for the NO/NO, YES/NO and implementation volunteer hospitals.

#### Diffusion and Degree of Adoption - A Closer Look at the 25 Volunteer Hospitals

We have indicated the distinction between diffusion and degree of adoption for the 25 volunteer hospitals (Diffu vs. Diffu 2), but have not as yet looked at the relationship between the two measures. Figure 3 indicates this relationship.

This graph indicates two things. First, that a limited amount of diffusion (Diffu 2) did occur in this group. And secondly, that the diffusion occurred most markedly in those hospitals which adopted the lodge.

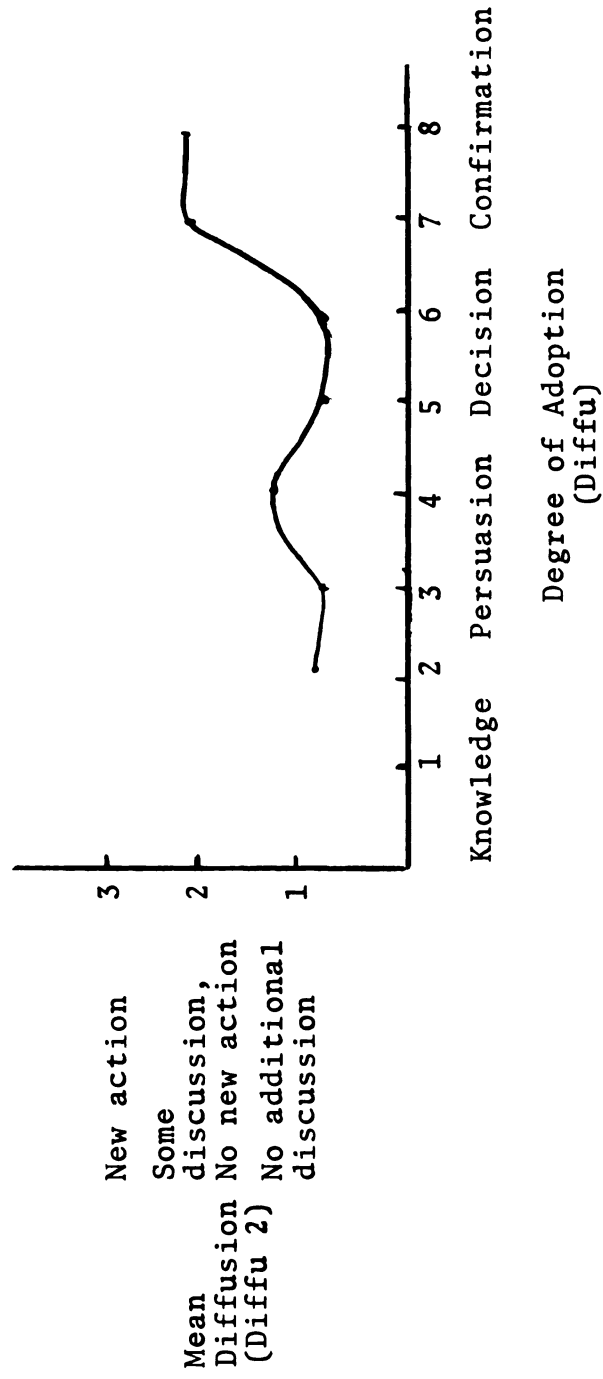


Figure 3. Comparison of Diffusion and Degree of Adoption for the 25 Volunteer Hospitals.

Cluster Analysis of Diffusion and  
Hypothesis-Testing Variables

An empirical V-Analysis (Tryon and Bailey, 1970) was done in each of the three groups of hospitals as described in the last section (NO/NO hospitals, YES/NO hospitals and YES/YES or NO/YES hospitals). The three separate analyses were decided upon due to the differences reported in Table 2. The results of the empirical V-Analysis failed to form a cluster which included the diffusion score (Diffu or Diffu 2) for the three groups of hospitals. These variables were rejected from the cluster analysis due to the fact that their communalities were below .20. The diffusion score appeared as a separate and distinct variable. This finding is itself an important one and will be discussed at length in Chapter IV.

In order to form a diffusion cluster, we then preset the diffusion score (Diffu or Diffu 2) and other cluster definers derived from the empirical analysis (Preset key-cluster analysis, Tryon and Bailey, 1970). In this way we are able to analyze our data with respect to specific variables related to diffusion and also investigate variables independent of that concept. The preset clusters which appear in the NO/NO and YES/NO hospitals had reliabilities of only .21 and .27 respectively. The factor loadings for the diffusion score



were relatively low for definers, .46 (NO/NO) and .52 (YES/NO). The 25 volunteer hospitals did, on the other hand, present a more reliable cluster. This is one indication that where diffusion does occur certain variables are related to it; and that its unreliability in the first two analyses is probably due in large part to the fact that little diffusion actually occurred in those hospitals.

#### The NO/NO Hospitals

The clusters obtained from those hospitals which indicated no willingness to adopt the lodge (Fairweather, et al., 1972) are presented in Table 3. The correlations between oblique cluster domains (correlations between the rotated oblique factors) are presented in Table 4.

#### Diffusion

This cluster is entitled "diffusion" because of the pre-set nature of the diffusion score (Diffu). The weakness of the cluster is immediately apparent due to the diffusion score's low factor loading (.46), a reliability of only .21, and the disparate nature of the variables included. Recalling the lack of diffusion reported above this is not an unexpected finding. Figure 4 reveals a non-normal curve not likely to enhance the

Table 3. The Ten Clusters in the NO/NO Hospitals.

| Cluster                                                               | Loading |
|-----------------------------------------------------------------------|---------|
| <u>Cluster 1. Diffusion</u>                                           |         |
| 1. Diffusion score (Diffu)                                            | .46     |
| 2. Low status head of group looking for new programs                  | .63     |
| 3. More funds for workshops                                           | .50     |
| 4. Hospital has little concern for community needs                    | .44     |
| <u>Cluster 2. "Middle" discipline total influence on new programs</u> |         |
| 1. Social work:                                                       |         |
| a. Greater breadth of influence                                       | .85     |
| b. Greater total influence                                            | .88     |
| 2. Psychology:                                                        |         |
| a. Greater breadth of influence                                       | .88     |
| b. Greater amount of influence                                        | .60     |
| c. Greater total influence                                            | .86     |
| 3. Nursing:                                                           |         |
| a. Greater breadth of influence                                       | .66     |
| 4. Vocational rehabilitation:                                         |         |
| a. Greater breadth of influence                                       | .68     |
| b. Greater total influence                                            | .66     |
| 5. Higher mean breadth of influence for hospital                      | .86     |
| <u>Cluster 3. Hospital census data</u>                                |         |
| 1. Greater increase in census (less decrease in census)               | 1.00    |
| 2. Less absolute difference in census, 1969-1970                      | .84     |
| 3. Less decrease in occupancy, 1969-1970                              | .76     |
| 4. Small number of total staff                                        | .35     |
| 5. Low staff/patient ratio                                            | .32     |
| <u>Cluster 4. Superintendent influence on new programs</u>            |         |
| 1. Superintendent:                                                    |         |
| a. Greater total influence                                            | 1.00    |
| b. Greater breadth of influence                                       | .87     |
| c. Greater amount of influence                                        | .70     |
| 2. The most influential discipline is a high status position          | .54     |
| <u>Cluster 5. Hospital expenses</u>                                   |         |
| 1. Greater increase in expenses, 1969-1970                            | .96     |
| 2. Greater absolute difference in expenses, 1969-1970                 | .93     |



Table 3. Continued

| Cluster                                                              | Loading |
|----------------------------------------------------------------------|---------|
| <u>Cluster 6. Adoption of Innovative programs</u>                    |         |
| 1. New Programs                                                      |         |
| a. Greater total number                                              | 1.00    |
| b. More in-hospital programs                                         | .81     |
| c. More community programs                                           | .45     |
| d. Higher community locus score                                      | .53     |
| e. Higher autonomy score                                             | .38     |
| <u>Cluster 7. Psychiatrist influence on new programs</u>             |         |
| 1. Psychiatrist:                                                     |         |
| a. Greater breadth of influence                                      | .95     |
| b. Greater total influence                                           | .84     |
| 2. Greater resistance in hospital                                    | .51     |
| <u>Cluster 8. Crises</u>                                             |         |
| 1. A crisis has occurred in the hos-<br>pital since our last contact | .93     |
| 2. More crises have occurred since<br>our last contact               | .92     |
| <u>Cluster 9. Amount of Influence on new programs</u>                |         |
| 1. Greater mean amount of influence<br>across all disciplines        | .89     |
| 2. Greater amount of influence:                                      |         |
| a. Social work                                                       | .79     |
| b. Nursing                                                           | .73     |
| c. Vocational rehabilitation                                         | .61     |
| d. Psychiatry                                                        | .41     |
| 3. Greater total influence:                                          |         |
| a. Nursing                                                           | .65     |
| 4. Lower variance of the amount of<br>influence                      | .53     |
| <u>Cluster 10. Committee to find new programs</u>                    |         |
| 1. More people on the committee                                      | .92     |
| 2. More disciplines represented<br>on comm.                          | .73     |
| 3. Less time spent in this function<br>by head of the group          | .42     |
| 4. Superintendent came to position<br>from outside the hospital      | .57     |
| 5. Superintendent is interested in<br>public relations               | .48     |

Table 4. Correlations Between Oblique Cluster Domains for the NO/NO Hospitals.

| Clusters                             | 1    | 2    | 3    | 4    | 5    | 6    | 7    | 8    | 9    | 10   |
|--------------------------------------|------|------|------|------|------|------|------|------|------|------|
| 1. Diffusion                         | -    | .08  | .22  | -.26 | -.41 | .42  | .08  | .15  | -.02 | -.16 |
| 2. Middle discipline total influence | .08  | -    | -.07 | .23  | .04  | .00  | .53  | -.15 | .44  | -.20 |
| 3. Hospital census data              | .22  | -.07 | -    | .29  | -.01 | -.22 | -.06 | -.13 | .10  | -.11 |
| 4. Superintendent influence          | -.26 | .23  | .29  | -    | .11  | -.15 | .34  | -.16 | .19  | -.01 |
| 5. Hospital expenses                 | -.41 | .04  | -.01 | .11  | -    | -.05 | .02  | -.12 | -.11 | -.09 |
| 6. Adoptiveness-Innovativeness       | .42  | .00  | -.22 | -.15 | -.05 | -    | -.01 | .10  | -.13 | .14  |
| 7. Psychiatrist Influence            | .08  | .53  | -.06 | .34  | .02  | -.01 | -    | .00  | .23  | -.12 |
| 8. Crises                            | .15  | -.15 | -.13 | -.16 | -.12 | .10  | .00  | -    | -.19 | .03  |
| 9. Amount of Influence               | -.02 | .44  | .10  | .19  | -.11 | -.13 | .23  | -.19 | -    | -.17 |
| 10. New program committee            | -.16 | -.20 | -.11 | -.01 | -.09 | .14  | -.12 | .03  | -.17 | -    |

necessary collinearity upon which both factor loading and reliability are based (Tryon and Bailey, 1970).

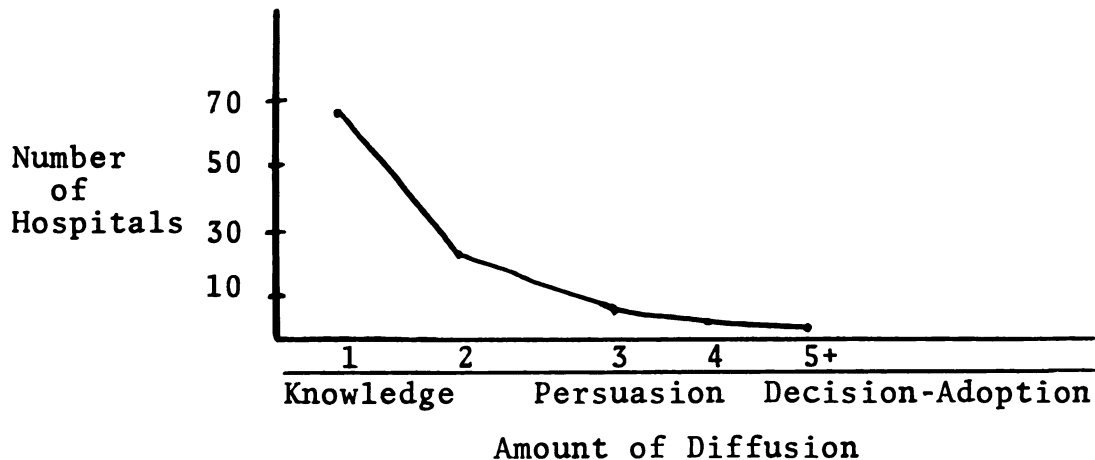


Figure 4. Amount of Diffusion in the NO/NO Hospitals.

The moderate relationship between this cluster and other cluster domains, Adoptiveness-Innovativeness (.42) and Hospital Expenses (-.41), and Superintendent Influence (-.26) must be looked at with these restrictions in mind. Nevertheless, it appears that the little diffusion which did occur, was related to hospital concepts other than just diffusion. This finding will be discussed more fully in Chapter IV.

#### Middle Discipline Influence

This cluster is essentially a group of variables measuring the breadth and total influence of social work, psychology, nursing and vocational rehabilitation in the hospital. The high relationship between this cluster,

Psychiatrist Influence (.53) and Amount of Influence (.44) reveals a group of variables which measure influence for all disciplines except the Superintendent.

#### Hospital Census Data

This cluster is a group of demographic variables descriptive of hospital census information. Mildly related to the census data are two staff variables. These indicate a low staff/patient ratio, and a lower number of staff. This cluster is only mildly related to two other clusters, Superintendent Influence (.29), and Adoptiveness-Innovativeness (-.22).

#### Superintendent Influence

This cluster includes the variables which measure the superintendent's amount, breadth and total influence in the hospital. It is interesting that this cluster is only mildly related to Middle Discipline Influence (.23) and moderately related to Psychiatrist Influence (.34). There appear to be three levels of influence reported in our sample, superintendent, psychiatry and "others." This cluster is also mildly related to Hospital Census (.29).

### Hospital Expenses

This cluster consists of two variables which indicate an increase in expenses from 1969-1970. Its relationship with other clusters is negligible.

### Adoptiveness-Innovativeness

This cluster includes all variables which investigate new programs recently adopted in the hospitals. It includes both the quantitative and qualitative measures, and indicates that the greater the number of programs, the more likely one of them will be innovative. It is relatively independent of other hospital clusters, and only mildly negatively related to Hospital Census (-.22), though it is related to the diffusion cluster (.42). This may indicate that the greater diffusers are also the most generally adopting. However, the low reliability of the diffusion cluster limits the interpretability of this finding.

### Psychiatrist Influence

This cluster includes breadth and total influence variables of psychiatry in the hospital. It is interesting that it also includes the measure of greater resistance to new programs in the hospital. It would appear that greater influence of psychiatry is associated with greater resistance. The high relationship between this



cluster and Middle Discipline Influence (.53) has been mentioned above. In addition, this cluster shows moderate relationship with the Superintendent Influence cluster (.34).

#### Crises

This cluster of two variables indicates the occurrence of a crisis in the hospital as reported by the respondent. Its relationship with other clusters are negligible.

#### Amount of Influence

This cluster contains variables descriptive of the amount of influence accorded social work, nursing, vocational rehabilitation and psychiatry as well as a greater mean of influence for new programs across all disciplines. In addition, it includes the variable indicating lower variance of influence scores and thus a kind of flatness of power. This cluster's relationship with Middle Discipline Influence (.44) and Psychiatrist Influence (.23) have been discussed above.

#### New Program Committee

This cluster includes variables which describe the committee for new programs and also two superintendent variables. The variables indicate a larger

committee, a superintendent interested in public relations and a superintendent who came from outside the hospital. This cluster is essentially unrelated to other clusters.

### The YES/NO Hospitals

The clusters obtained from the hospitals which indicated a willingness to receive a brochure, attend a workshop or develop a demonstration ward, but would not volunteer to implement the lodge are presented in Table 5. In Table 6 the correlations between oblique cluster domains (correlations between the rotated oblique factors) are presented. Note at the outset the striking resemblance to the clusters of the NO/NO hospitals.

### Diffusion

This cluster is subject to the same reservations as expressed for the NO/NO hospital diffusion cluster. The factor loading of the diffusion score is only .52, reliability is .27 and once again the mean diffusion is low, 2.20 indicating an overemphasis at the low end of the diffusion scale. In this case, experimental conditions become variables in the cluster, including persuasion condition, interviewer and respondent variables. These latter two variables merely

Table 5. The Nine Clusters in the YES/NO Hospitals.

| Cluster                                                                       | Loading |
|-------------------------------------------------------------------------------|---------|
| <u>Cluster 1. Diffusion</u>                                                   |         |
| 1. Diffusion score                                                            | .52     |
| 2. Experimental conditions                                                    |         |
| a. More active persuasion condition                                           | .70     |
| b. Lower status respondent                                                    | .41     |
| c. Interviewer was B.P.                                                       | .58     |
| 3. Other                                                                      |         |
| a. More money for rewards                                                     | .83     |
| b. Higher status head of group<br>looking for new programs                    | .44     |
| <u>Cluster 2. Total influence of all disciplines<br/>below superintendent</u> |         |
| 1. Social work                                                                |         |
| a. Greater breadth of influence                                               | .95     |
| b. Greater total influence                                                    | .88     |
| 2. Psychology                                                                 |         |
| a. Greater breadth of influence                                               | .80     |
| b. Greater total influence                                                    | .73     |
| 3. Nursing                                                                    |         |
| a. Greater breadth of influence                                               | .75     |
| b. Greater total influence                                                    | .70     |
| 4. Vocational Rehabilitation                                                  |         |
| a. Greater breadth of influence                                               | .69     |
| b. Greater total influence                                                    | .61     |
| 5. Psychiatry                                                                 |         |
| a. Greater breadth of influence                                               | .68     |
| b. Greater total influence                                                    | .53     |
| 6. Greater resistance to new programs                                         | .51     |
| 7. Greater mean amount of influence                                           | .92     |
| <u>Cluster 3. Hospital size</u>                                               |         |
| 1. Larger staff                                                               | .96     |
| 2. Larger budget                                                              | .96     |
| 3. Greater difference in census, 1969-<br>1970                                | .66     |
| 4. Greater difference in staff, 1969-<br>1970                                 | .42     |
| <u>Cluster 4. Adoptiveness-Innovativeness</u>                                 |         |
| 1. New programs                                                               |         |
| a. Greater total number                                                       | 1.00    |
| b. More in-hospital programs                                                  | .81     |
| c. High community locus score                                                 | .44     |
| 2. Committee to find new programs                                             |         |
| a. Meets rarely                                                               | .52     |
| b. Greater diffusion of its informa-<br>tion                                  | .40     |

Table 5. Continued

| Cluster                                                         | Loading |
|-----------------------------------------------------------------|---------|
| <u>Cluster 5. Hospital expenses</u>                             |         |
| 1. Greater increase in expenses                                 | 1.00    |
| 2. Greater absolute difference in expenses                      | .91     |
| <u>Cluster 6. Superintendent influence on new programs</u>      |         |
| 1. Superintendent                                               |         |
| a. Greater amount of influence                                  | .88     |
| b. Greater breadth of influence                                 | .66     |
| c. Greater total influence                                      | .69     |
| 2. The most influential discipline is a high status position    | .74     |
| <u>Cluster 7. Amount of influence on new programs</u>           |         |
| 1. Greater mean amount of influence across all disciplines      | .97     |
| 2. Greater amount of influence                                  |         |
| a. Social work                                                  | .79     |
| b. Nursing                                                      | .69     |
| c. Psychology                                                   | .61     |
| d. Vocational rehabilitation                                    | .60     |
| e. Psychiatry                                                   | .35     |
| 3. Low variance of the amount of influence                      | .62     |
| <u>Cluster 8. Crises</u>                                        |         |
| 1. A crisis has occurred in the hospital since our last contact | .90     |
| 2. More crises have occurred since the last contact             | .92     |
| <u>Cluster 9. Hospital census data</u>                          |         |
| 1. Greater increase in census (less decrease in census)         | .90     |
| 2. Less decrease in occupancy, 1969-1970                        | .80     |
| 3. Superintendent is interested in community programs           | .86     |
| 4. Informal source of new programs has low status               | .42     |

Table 6. Correlations Between Oblique Cluster Domains for the YES/NO Hospitals.

| Clusters                       | 1    | 2    | 3    | 4    | 5    | 6    | 7    | 8    | 9    |
|--------------------------------|------|------|------|------|------|------|------|------|------|
| 1. Diffusion                   | -    | .17  | .08  | .12  | -.01 | .01  | .22  | .16  | .04  |
| 2. Total influence             | .17  | -    | .21  | .03  | .19  | .11  | .47  | -.07 | .32  |
| 3. Hospital Size               | .08  | .21  | -    | .14  | -.03 | .03  | .11  | .02  | .46  |
| 4. Adoptiveness-Innovativeness | .12  | .03  | .14  | -    | -.08 | .04  | -.15 | .04  | -.04 |
| 5. Hospital expenses           | -.01 | .19  | -.03 | -.08 | -    | .05  | .13  | -.19 | .07  |
| 6. Superintendent influence    | .01  | .11  | .03  | .04  | .05  | -    | -.10 | -.03 | .27  |
| 7. Amount of influence         | .22  | .47  | .11  | -.15 | .13  | -.10 | -    | -.06 | .13  |
| 8. Crises                      | .16  | -.07 | .02  | .04  | -.19 | -.03 | -.06 | -    | .01  |
| 9. Hospital census data        | .04  | .32  | .46  | -.04 | .07  | .27  | .13  | .01  | -    |

indicate that one interviewer was associated with hospitals which had higher diffusion scores and that the respondent in the greater diffusing hospitals was of lower status. However, the other experimental variable indicates an important finding. The more active the persuasion condition, the more diffusion which occurred in the hospitals which did, in fact, allow the persuasion attempt. Apparently, the more active the process of involvement, the more intense will be future activity (diffusion). It is also of interest, that unlike the NO/NO diffusion cluster, this cluster is virtually unrelated to other cluster domains. This will be discussed further in Chapter IV.

#### Total Influence

This cluster is identical to the Middle Discipline Influence cluster of the NO/NO hospitals with the addition of the Psychiatrist Influence cluster (Table 3). It includes the breadth and total influence of all disciplines below superintendent, and the resistance measure. It is moderately related to both Amount of Influence (.47) and Hospital Census (.32). We see here a clear distinction between the superintendent and other disciplines since the correlation between this cluster and the Superintendent Influence cluster is only .11.



### Hospital Size

This cluster did not appear in the NO/NO hospital clusters, though it is moderately related to the Hospital Census cluster (.46) which appears in both. This cluster is described by variables indicating a large hospital in terms of staff, budget and differences in census and staff. It is interesting to note that hospital size is virtually unrelated to measures of Adoptiveness-Innovativeness (.14).

### Adoptiveness-Innovativeness

This cluster is similar to the Adoptiveness-Innovativeness cluster presented previously (Table 3). It includes total new programs, more in-hospital programs and the community locus score. It does not include more community programs or the autonomy score. The addition of two variables concerned with the new program committee is interesting, though limited. This cluster's correlations with other clusters are negligible.

### Hospital Expenses

This cluster is identical to the Hospital Expenses cluster reported earlier. Its relationship with other clusters is negligible.



### Superintendent Influence

This cluster, once again, is identical to the Superintendent Influence cluster presented in the NO/NO hospital analysis. The moderate relationship between this cluster and the Psychiatrist Influence cluster and Middle Discipline Influence cluster does not appear for these hospitals. Apparently the superintendent is seen as less a part of the other disciplines than in the NO/NO hospitals. Only with Hospital Census (.27) does the correlation with another cluster reach even a mild relationship.

### Amount of Influence

This cluster is another which is virtually identical to a cluster presented in Table 3. This includes the amount of influence variables of all disciplines except superintendent. It is moderately related (.47) to the Total Influence cluster.

### Crises

This cluster is identical to the Crises cluster in Table 3. It is, once again, virtually unrelated to all other clusters.

## Hospital Census Data

This cluster is similar to the Hospital Census cluster in Table 3, though it is not as consistent. It includes only two census variables, and adds one superintendent and one new program source variable. Its relationship to the Total Influence (.32), Hospital Size (.46) and Superintendent Influence (.27) clusters have been mentioned previously.

## The YES/YES and NO/YES Hospitals (Volunteers)

The clusters obtained from the 25 hospitals which indicated a willingness to implement the lodge are presented in Table 7. This analysis was only done with the twenty-five hospitals which volunteered to adopt the lodge. This decreased N size has some implications for the interpretability of the obtained clusters, though it appears to offer some valuable leads. The diffusion score employed in this analysis is Diffu 2, while Diffu still indicates the degree of adoption of the lodge. In Table 8, we have presented the correlations between oblique cluster domains (correlations between the rotated oblique factors).

## Diffusion

In this analysis a strong diffusion cluster appears. The diffusion variable (Diffu 2) has a factor

Table 7. The Three Clusters in the Implementation Volunteer Hospitals.

| Cluster                                                       | Loading |
|---------------------------------------------------------------|---------|
| <u>Cluster 1. Diffusion</u>                                   |         |
| 1. Diffusion-adoption                                         |         |
| a. More diffusion since last implementation attempt (Diffu 2) | .88     |
| b. Greater degree of adoption (Diffu)                         | .80     |
| 2. Hospital power structure                                   |         |
| a. Less amount of influence by the superintendent             | .65     |
| b. Less amount of influence by psychiatry                     | .61     |
| c. Lower mean amount of influence                             | .54     |
| 3. Hospital is not generally for new programs                 | .45     |
| <u>Cluster 2. Information gathering - Stability</u>           |         |
| 1. Positive information gathering                             |         |
| a. More funds for workshops                                   | .98     |
| b. More funds for travel                                      | .92     |
| c. Funds exist to reward staff for new ideas                  | .49     |
| d. Hospital actively looks for new programs                   | .75     |
| e. There is a committee to look for new programs              | .45     |
| f. More disciplines on the new program committee              | .51     |
| g. More people on the new program committee                   | .48     |
| 2. Crisis                                                     |         |
| a. Few crises occurred                                        | .69     |
| b. Little change due to crisis                                | .56     |
| c. A crisis did occur                                         | .43     |
| 3. Present programming                                        |         |
| a. All programs approved were implemented                     | .65     |
| b. Programs are seen as fine the way they are                 | .49     |
| 4. Staff, expenses                                            |         |
| a. Small change in staff, 1969-1970                           | .71     |
| b. More staff, 1969-1970                                      | .67     |
| c. Small numbers of total staff                               | .54     |
| d. Small budget                                               | .45     |
| e. Low staff/patient ratio                                    | .41     |

Table 7. Continued.

| Cluster                                                        | Loading |
|----------------------------------------------------------------|---------|
| 5. "Middle" discipline influence                               |         |
| a. Greater amount of influence-<br>psychology                  | .61     |
| b. Greater amount of influence-<br>nursing                     | .50     |
| c. Greater breadth of influence-<br>social work                | .61     |
| d. Greater breadth of influence-<br>psychology                 | .49     |
| e. Greater breadth of influence-<br>vocational rehabilitation  | .48     |
| f. Greater total influence-social<br>work                      | .58     |
| g. Greater total influence-psychology                          | .52     |
| h. Higher mean breadth of influence                            | .56     |
| 6. Experimental conditions                                     |         |
| a. More active persuasion condition                            | .49     |
| b. Interviewer was B.P.                                        | .52     |
| <u>Cluster 3. Adoptiveness-Innovativeness</u>                  |         |
| 1. Innovative programming                                      |         |
| a. Greater total number of new pro-<br>grams                   | 1.00    |
| b. Greater number of in-hospital<br>programs                   | .85     |
| c. Greater number of community pro-<br>grams                   | .55     |
| d. Higher autonomy score                                       | .53     |
| e. Higher community-locus score                                | .52     |
| f. Less resistance to new programs                             | .43     |
| 2. Superintendent role                                         |         |
| a. Superintendent seen as innovative                           | .55     |
| b. Superintendent came to hospital<br>from inside the hospital | .48     |
| 3. Search for new programming                                  |         |
| a. New program committee does little<br>with their information | .82     |
| b. New program committee meets rarely                          | .71     |
| c. Informal source for new programs<br>is a low status person  | .71     |
| d. Less money for the library                                  | .42     |

loading of .88. There was some diffusion beyond mere discussion in contrast to our finding in the NO/NO and YES/NO hospitals. While only 4 percent (6 of the 219 hospitals) of the hospitals in those two conditions achieved a level greater than discussion, 20 percent (5 of 25) of the implementation volunteer hospitals made actual new movement towards adoption.

Table 8. Correlations Between Oblique Cluster Domains for the Implementation Volunteer Hospitals.

|                                    | 1    | 2   | 3    |
|------------------------------------|------|-----|------|
| 1. Diffusion                       | -    | .04 | -.11 |
| 2. Information gathering-Stability | .04  | -   | .11  |
| 3. Adoptiveness-Innovativeness     | -.11 | .11 | -    |

As indicated in Figure 3, greater degree of adoption (Diffu) is related to more subsequent diffusion. In addition, the power structure variables included in this cluster are interesting; less amount of influence for both superintendent and psychiatry, and a lower mean amount of influence for the hospital. It appears that lessened traditional hierarchical power is related

to diffusion and adoption. Yet the final variable included indicates that verbally the hospital does not encourage new programs. This cluster is virtually unrelated to either of the other two clusters.

#### Information gathering - Stability

This cluster includes several variables which seem to express a feeling of stability in the hospital. These include variables descriptive of few crises, satisfaction with present programming, small changes in staff numbers, and generally equal influence across psychology, nursing, social work and vocational rehabilitation.

A second aspect of this cluster is the variables which indicate a positive approach to information gathering. These include more funds for workshops, travel, and rewards for innovative ideas as well as variables indicating a large committee to look for new programs. Finally, experimental condition variables are also included, though they make little rational sense. This cluster is unrelated to the other two clusters.

#### Adoptiveness-Innovativeness

This cluster differs from the Adoptiveness-Innovativeness clusters of the previous two discussions in that it includes both programming variables and

variables describing the superintendent's role and general information-seeking. In addition to the innovative programming variables, we find variables describing the superintendent as innovative and as coming from within the hospital structure. It is interesting that the information-gathering variables are negative ones; the new program committee meets rarely and does little with their information. The positive variables of information-gathering appeared in Cluster 2; and appear to be a part of a stable, not innovative system. As indicated previously, this cluster is unrelated to the other two clusters.

#### Hypothesis-Testing Variables

Table 9 is a summary of the cluster loadings for each hypothesis-testing variable on diffusion. All loadings over .40 are marked with an asterisk (\*).

What is immediately apparent is the lack of loadings over .40, and the resultant disconfirmation of virtually all hypotheses in all three conditions. In fact, the only hypothesis which may be considered even partially confirmed is Hypothesis 5, for implementation volunteer hospitals. There is some indication of less hierarchical structure in decision-making regarding new programs. The low amount of influence for superintendent and psychiatry, the low mean influence, and the general

Table 9. Cluster Loadings of Hypothesis-Testing Variables on Diffusion Score.

| Hypotheses                                                             | Cluster Loading |        |                 |
|------------------------------------------------------------------------|-----------------|--------|-----------------|
|                                                                        | Hospitals       |        |                 |
|                                                                        | NO/NO           | YES/NO | YES/YES, NO/YES |
| <u>Hypothesis 1.</u>                                                   |                 |        |                 |
| 1. Is there a group or individual to look for new programs?            | -.06            | .20    | -.31            |
| 2. No. of people in group                                              | -.03            | -.05   | .26             |
| 3. No. of disciplines in group                                         | -.12            | -.14   | .13             |
| 4. What is done with information?                                      | .61*            | .12    | .18             |
| 5. How often does group meet?                                          | -.04            | .03    | .25 (N=8)       |
| 6. Is there an informal contact for new programs?                      | .21             | -.19   | -.05            |
| 7. Status of informal contact                                          | -.27            | -.15   | -.53* (N=6)     |
| 8. Status of head of group                                             | -.63*           | .44*   | .57*            |
| <u>Hypothesis 2.</u>                                                   |                 |        |                 |
| 1. Is reporting and receiving new information a goal of your hospital? | .20             | .36    | -.27            |
| 2. Do staff members present programs?                                  | .26             | .21    | .08             |
| 3. Are there funds for:                                                |                 |        |                 |
| a. Workshops                                                           | .50*            | .06    | .02             |
| Amount                                                                 | .14             | -.31   | .19             |



Table 9. Continued.

| Hypotheses                                            | Cluster Loading |              |                    |
|-------------------------------------------------------|-----------------|--------------|--------------------|
|                                                       | Hospitals       |              |                    |
|                                                       | NO/NO           | YES/NO       | YES/YES, NO/YES    |
| b. Library Amount                                     | .18<br>.28      | .12<br>.06   | .23<br>.10         |
| c. Travel Amount                                      | .27<br>-.19     | -.22<br>-.02 | -.20<br>-.12       |
| d. Rewards Amount                                     | .13<br>-.44*    | .13<br>.83*  | -.32<br>.43* (N=9) |
| 4. Relative importance of innovative ideas            | .05             | .23          | .30                |
| <u>Hypothesis 3.</u>                                  |                 |              |                    |
| 1. Have any new administrators joined the hospital?   | -.14            | .02          | .17                |
| 2. No. of positions changed                           | -.07            | .15          | .22                |
| 3. No. of years of superintendent in office           | -.13            | .13          | .25                |
| 4. Did superintendent come from outside the hospital? | -.21            | .17          | .04                |
| <u>Hypothesis 4.</u>                                  |                 |              |                    |
| 1. Has there been a crisis?                           | .24             | .21          | .09                |
| 2. No. of crises?                                     | .04             | .08          | -.06               |
| 3. Was the crisis resolved?                           | .30             | .05          | .04                |
| 4. How much change due to crisis?                     | .10             | -.33         | -.47*              |
| (Demographics)                                        |                 |              |                    |
| 5. Increase in occupancy rate                         | .14             | .09          | .03                |

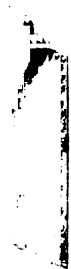
Table 9. Continued.

| Hypotheses                   | Cluster Loading |        |                 |
|------------------------------|-----------------|--------|-----------------|
|                              | Hospitals       |        |                 |
|                              | NO/NO           | YES/NO | YES/YES, NO/YES |
| 6. Increase in census        | .17             | -.01   | .04             |
| 7. Increase in expenses      | -.42*           | .03    | -.08            |
| 8. Increase in staff         | -.08            | -.32   | -.05            |
| <u>Hypothesis 5.</u>         |                 |        |                 |
| 1. Amount of influence       |                 |        |                 |
| a. Supt.                     | -.29            | .11    | -.65*           |
| b. Psychiatrist              | .00             | -.07   | -.61*           |
| c. Psychologist              | .21             | -.07   | -.26            |
| d. Social Worker             | -.11            | .30    | -.22            |
| e. Nursing                   | .11             | .21    | .06             |
| f. Vocational Rehabilitation | -.09            | -.07   | .27             |
| 2. Breadth of influence      |                 |        |                 |
| a. Supt.                     | .07             | -.04   | -.34            |
| b. Psychiatrist              | .09             | .17    | .12             |
| c. Psychologist              | .06             | .08    | .10             |
| d. Social Worker             | .03             | .14    | .20             |
| e. Nursing                   | .10             | .25    | .35             |
| f. Vocational Rehabilitation | .23             | -.05   | .31             |
| 3. <u>Total influence</u>    |                 |        |                 |
| a. Supt.                     | .06             | -.03   | -.42*           |
| b. Psychiatrist              | -.01            | .11    | -.32            |
| c. Psychologist              | .19             | -.02   | -.10            |
| d. Social Worker             | .00             | .23    | .08             |
| e. Nursing                   | .15             | .27    | .31             |
| f. Vocational Rehabilitation | .26             | -.18   | .25             |
| 4. Mean breadth of influence | .13             | .14    | .23             |
| 5. Mean influence            | -.04            | .10    | -.54*           |
| 6. Variance of influence     | .31             | -.07   | .12             |
| 7. Amount of resistance      | .23             | .10    | -.02            |



Table 9. Continued.

| Hypotheses                                        | Cluster Loading |        |                 |
|---------------------------------------------------|-----------------|--------|-----------------|
|                                                   | Hospitals       |        |                 |
|                                                   | NO/NO           | YES/NO | YES/YES, NO/YES |
| 8. Supt.-Role                                     |                 |        |                 |
| a. leader                                         | .00             | .19    | .00             |
| b. innovative pro-<br>gramming                    | -.17            | .37    | .24             |
| c. community pro-<br>gramming                     | -.13            | .02    | -.17            |
| d. public relations                               | .07             | .13    | -.25            |
| <u>Hypothesis 6.</u>                              |                 |        |                 |
| 1. Positive subjective<br>assessment of hospital  | .26             | -.12   | -.05            |
| 2. How much better should<br>programs be?         | -.35            | .06    | -.05            |
| <u>Hypothesis 7.</u>                              |                 |        |                 |
| 1. Is the hospital for<br>starting new programs?  | -.24            | .18    | -.45*           |
| 2. Any programs approved,<br>but not implemented? | .26             | .04    | -.37            |
| 3. Any programs discon-<br>tinued?                | .12             | -.03   | -.25            |
| <u>Hypothesis 8.</u>                              |                 |        |                 |
| <u>Systemic</u>                                   |                 |        |                 |
| 1. <u>Concerns</u>                                |                 |        |                 |
| a. local community                                | -.16            | .00    | -.35            |
| b. optimal answer                                 | -.30            | .12    | -.32            |
| c. evaluation                                     | .20             | -.09   | -.17            |
| d. community needs                                | -.44*           | .07    | -.26            |
| e. active search for<br>new programs              | -.04            | .25    | -.33            |



pattern of loadings, reveals some degree of influence for those disciplines below the traditional strong ones, particularly nursing.

## CHAPTER IV

### DISCUSSION

#### Diffusion

##### Amount of Diffusion

The lack of diffusion of the lodge concept is the most distinguishing characteristic of the 219 hospitals which had initially refused to implement the lodge. Other writers have warned that innovations do not spread automatically (Glaser, 1967). It appears that innovations such as the lodge only spread with a maximum effort from the research team's action consultants. Anything less than full scale implementation attempts (as with the 25 volunteer hospitals, see below) seems to result in little or no significant diffusion of a complex concept.

The amount of diffusion since the last contact with the non-volunteer hospitals reveals no more than the difference between awareness of the lodge and ignorance of it. Over half of these respondents revealed no awareness of the lodge program. Of those aware of the concept, only eight indicated movement beyond

discussion. Little lodge diffusion occurred automatically; and it only rarely occurred even in those hospitals which had been exposed to persuasion attempts (YES/NO hospitals).

The 25 hospitals which volunteered to implement the lodge are markedly different from the 219 hospitals just discussed. This has been examined earlier in the present study. The major experimental difference is that each of these hospitals was subjected to implementation efforts beyond the final contact with the other 219 hospitals. There were planned attempts made to implement the lodge. Therefore, "diffusion" for these hospitals, while parallel to diffusion for the non-volunteers, requires a revised definition (see Appendix D). The diffusion score (Diffu 2) here measures progress towards adoption of a lodge since the last implementation effort; e.g., for those hospitals which had actually implemented the lodge, this was a measure of progress towards adoption of a second lodge.

For this group of hospitals, some diffusion did occur, as shown in Figure 3. It is still minimal, but discernible. Figure 3 also reveals that the diffusion which did occur, took place in those hospitals which had adopted the lodge during implementation attempts. For the most part, those who stopped short of adopting the lodge during active implementation efforts, did not



complete adoption once those efforts were discontinued. The diffusion which occurred was among those hospitals which had adopted one lodge, and continued to develop new lodges without direct outside intervention.

This finding is similar to a major finding of the previous implementation study (Fairweather, Sanders and Tornatzky, 1972) and indicates another variation of the "foot in the door" technique. It is the hospitals that are actively involved in a program, and which have previously committed themselves to it, which continue to diffuse the innovation. Even in the YES/NO hospitals it was the more actively approached hospitals which diffused more. Just as with adoption, diffusion is more likely if the adopters are actively involved in the implementation process.

### Diffusion Hypotheses

In Table 9 we presented the cluster loadings which directly test each of the eight hypotheses forwarded earlier. Those loadings above .40 have been marked with an asterisk, and these indicate the variables which are significantly related to diffusion. We will now look at each hypothesis, and discuss any confirmation which appears in either the NO/NO, YES/NO or volunteer condition.

### Hypothesis 1.

All three conditions reveal variables indicating the importance of specialized roles for information-seeking. It is not mere appearance of such a group (as hypothesized) which is important, but certain characteristics of it. In the YES/NO and volunteer hospitals, diffusion is related to a higher status individual as head of the group, while in the NO/NO hospitals diffusion is related to a lower status person in that position. In addition, in the volunteer hospitals, the informal contact is of low status in the most diffusing hospitals. This latter finding may indicate that the formal group must be legitimized by a high status leader, though the "work" may be done by a more informal, low status contact.

### Hypothesis 2.

Once again, all three conditions reveal significant loadings in this hypothesis. And once again, the NO/NO hospitals reverse the findings of the YES/NO and volunteer hospitals. The latter two groups associate more money for staff rewards with diffusion while the former indicates less money for innovative idea rewards. This distinction between the three conditions will be discussed further in the next section of this paper. Apparently, the amount of diffusion is not the only difference among them.

### Hypothesis 3.

There were no significant loadings indicating any relationship between diffusion and change in leadership.

### Hypothesis 4.

Only two variables revealed a significant relationship between diffusion and crisis in the hospital. In the NO/NO hospitals the lower increase in budget (often seen as a crisis by our respondents) was related to diffusion. In the volunteer condition, the fact that there was less change due to a crisis is associated with diffusion, though mere occurrence of crises is not (as hypothesized). This is not a particularly strong confirmation of our hypothesis.

### Hypothesis 5.

Only in the volunteer hospitals are there significant relationships between power structure variables and diffusion. But these relationships are perhaps the most consistent and most confirming of the study. Diffusion is associated with less importance of influence (mean amount of influence) and, in particular, with less power in the generally most influential disciplines (superintendent and psychiatry). This seems to associate less traditional and hierarchical structures with diffusion.

#### Hypothesis 6.

There were no significant loadings indicating any relationship between diffusion and "pride."

#### Hypothesis 7.

Once again, only in the volunteer hospitals is there a significant relationship between diffusion and a relevant variable. But in this case, the relationship does not support the hypothesis that diffusion is positively related to a change-oriented hospital. Diffusion is significantly negatively related to the hospital wishing to start new programs. Apparently, the less a hospital is verbally committed to new programs, the more diffusion there will be of any specific program. Perhaps acceptance of any new program is associated with those hospitals which are indiscriminate in their choice of new programs and not those who would carefully weigh a concept such as the lodge.

#### Hypothesis 8.

Only in the NO/NO hospitals is there any indication of the significance of systemic perspective. But this finding, in fact, is the opposite of the hypothesis. A concern with community needs is negatively related to diffusion. In the volunteer hospitals all of the systemic

variables are also negatively related and three approach significance. Such verbal systemic concerns are not related to diffusion as hypothesized.

#### Relationship Between Diffusion Cluster and Other Clusters

In Tables 4, 6, and 8 we have looked at the relationship between the cluster domains found in each condition. Except for the NO/NO hospitals, diffusion is represented by an independent cluster, unrelated to other domains. Only in the NO/NO hospitals, which refused all attempts at intervention, is diffusion related to other clusters: adoptiveness-innovativeness, expenses and superintendent influence. This, together with the finding that diffusion was related to more active persuasion attempts in the YES/NO hospitals, reveals a great deal about diffusion as a concept and its relationship to outside intervention.

Completely unplanned diffusion is related to more general hospital characteristics; in this case less power in the superintendent, lower increase in expenses and greater general adoptiveness-innovativeness. But once intervention is introduced into the system, that intervention is an important diffusion factor. In fact, diffusion is largely determined by those intervention attempts. Diffusion may be related to general

1. The first part of the document is a list of the names of the persons who were present at the meeting.

2. The second part of the document is a list of the names of the persons who were absent from the meeting.

hospital characteristics if left alone, but not once intervention activities begin. The intervention attempts appear to alter other relationships which may exist without it.

### Overview of Additional Results

In addition to the results which relate directly to diffusion, the cluster analyses employed disclose other interesting findings.

#### The Non-Volunteers

The clusters reported in Table 3 and Table 5 reveal little difference between the 102 NO/NO and the 117 YES/NO hospitals. It would appear that the clusters presented in Chapter III are consistent for hospitals which did not volunteer to implement the lodge. In Table 10 we present a comparison of these two populations. We have included the clusters of the implementation volunteers for completeness. Eight of the nine YES/NO clusters also appeared in the NO/NO hospitals. The two conditions are virtually indistinguishable in terms of their cluster domains. Due to this similarity, much of the subsequent discussion will refer to these hospitals as implementation non-volunteers because the distinction between NO/NO and YES/NO hospitals is less important. In addition, this focuses further attention on the uniqueness of the volunteer hospitals.

Table 10. Clustered Measures in the Implementation Non-Volunteer and Volunteer Hospitals.

| NO/NO                                     |  | YES/NO                                                         |  | YES/YES and NO/YES                        |  |
|-------------------------------------------|--|----------------------------------------------------------------|--|-------------------------------------------|--|
| Cluster <sup>a</sup>                      |  | Cluster                                                        |  | Cluster                                   |  |
| 1. Diffusion (4)                          |  | 1. Diffusion <sup>b</sup> (6)                                  |  | 1. Diffusion (6)                          |  |
| 2. "Middle discipline total influence (9) |  | 2. Total influence-disciplines below Supt. <sup>b</sup> (12)   |  | 2. Information gathering - Stability (27) |  |
| 3. Hospital census (5)                    |  | 3. Hospital size (4)                                           |  | 3. Adoptiveness - Innovativeness (12)     |  |
| 4. Superintendent (4)                     |  | 4. Adoptiveness <sup>b</sup> - Innovativeness <sup>b</sup> (5) |  |                                           |  |
| 5. Adoptiveness-Innovativeness (5)        |  | 5. Hospital expenses <sup>b</sup> (2)                          |  |                                           |  |
| 6. Hospital expenses (2)                  |  | 6. Superintendent <sup>b</sup> (4)                             |  |                                           |  |
| 7. Psychiatrist (3)                       |  | 7. Amount of influence <sup>b</sup> (7)                        |  |                                           |  |
| 8. Crises (2)                             |  | 8. Crises <sup>b</sup> (2)                                     |  |                                           |  |
| 9. Amount of influence (7)                |  | 9. Hospital census <sup>b</sup> (4)                            |  |                                           |  |
| 10. Committee for new programs (5)        |  |                                                                |  |                                           |  |

<sup>a</sup>The number in parentheses after each cluster name represents the number of variables included in that cluster.

<sup>b</sup>This cluster is identical to or highly similar to a cluster found in the NO/NO hospital clusters.



For the non-volunteer hospitals, measures of the adoption of innovative programming formed reliable, rational clusters. The data indicates that the total number of new programs is related to a higher community locus score and/or a higher patient-autonomy score. This would indicate that if a hospital begins several programs, it is more likely that a community-orientation and patient autonomy will appear. This does not mean that all programs are innovative, only that there will be innovative elements appearing when many programs are on-going.

Other than two committee variables in the YES/No hospitals, the only variables included in the adoptiveness-innovativeness clusters are those which define innovative programs. The hospital, demographic, attitude and power variables are not included. In addition, this cluster is unrelated to other clusters which include more general hospital variables. Such a finding forces us to consider the independence of adoptiveness-innovativeness as a concept.

Up to this point we have been discussing this group of variables under the title adoptiveness-innovativeness. It is important to consider the necessity for such a title. From the perspective of many hospitals, the adoption of any program is an innovative act. However, from the perspective of many theoreticians and

researchers, this is not the case. Rather, to them it is not innovative to adopt a program which does not in fact change the normal functioning of that institution in terms of role changes, status changes or actual organizational changes. The concept we have empirically found crosses into both of those domains. It includes variables describing both quantitative and qualitative programming changes. Therefore the necessity of employing the title, adoptiveness-innovativeness.

In either case, it would appear that these concepts are associated with variables not tapped in this study. This suggests that for many institutions, the spreading of an innovation must be designed with each institutions' characteristics well in mind. It is not the general hospital variables that are important, but variables specific to each hospital. Approaches to each hospital must be designed with both the innovation and the institution in mind. The findings of the hospital implementation study reveal that for the lodge, certain approaches were appropriate, and seem most effective in spreading it as an innovation. This finding is not contradicted here, though the generalizability of previous results are limited by these findings.

The independence of our measures of general adoptiveness-innovativeness of programs is an important finding. We see no support for the concept of the

generally adopting and innovative hospital. For these 219 hospitals, and to a limited extent for the 25 volunteers, adoption of innovative programs could not be predicted from the general hospital variables measured. Adoption and innovation appear to be independent and unique functions. They are most likely associated with characteristics unique to each institution, each innovation and with general aspects of the innovation process itself which were not tapped in this study.

With regard to power structure, we find essentially two levels of influence for new programs, superintendent and "others." Psychiatrist influence seems to cross both lines while not directly aligning with either. The most striking result is the flatness of power of the middle disciplines: psychology, social work, nursing and vocational rehabilitation. The evenness may be due in part to the unitization movement in many hospitals. Many respondents indicated that dividing the hospital into units, levels out the influence of the hospital structure. However, such flatness is on the unit level among middle disciplines. The superintendent is still the most powerful, and the psychiatrist still exhibits his influence. Table 11 gives the mean values of amount of influence and supports the above discussion.

Table 11. Mean Values of Amount of  
Influence - Implementation  
Non-Volunteers.<sup>a</sup>

| NO/NO Hospitals |      | YES/NO Hospitals |      |
|-----------------|------|------------------|------|
| Superintendent  | 4.53 | Superintendent   | 4.39 |
| Psychiatry      | 3.78 | Psychiatry       | 3.80 |
| Nursing         | 3.47 | Psychology       | 3.47 |
| Psychology      | 3.35 | Social Work      | 3.34 |
| Social Work     | 3.35 | Nursing          | 3.27 |

<sup>a</sup>Ranked such that "1" is no influence - "5" is greatest influence.

Many assumptions regarding innovation and diffusion revolve around the importance of budget, staff and census considerations. We find no basis for this concern in our sample. Hospital expenses and census data were related only to themselves, not to innovativeness or any other cluster. A similar finding with regard to lodge adoption was found in the previous implementation study.

#### The Implementation Volunteer Hospitals

For numerous reasons, the 25 implementation volunteers were examined separately in the present study. They have each been subjected to active implementation

attempts, they have diffused more information about the lodge and their cluster analysis revealed different domains from those found in the non-volunteers. We must also reemphasize that the reduced N size has serious implications for interpretability of our analysis.

As noted above, adoptiveness-innovativeness is a separate and distinct cluster from diffusion, unlike the finding in the non-volunteer clusters. For these hospitals, it is significantly related to other types of variables. The superintendent's being innovative and from inside the hospital are related to innovativeness. Carlson (1965) had indicated that change in leadership, less tenure of leadership and superintendent's from outside the school system were related to innovativeness. These results stand in opposition to his findings.

Also, variables related to the search for new programs are related to adoptiveness-innovativeness in a curious way. We find here variables which seem to indicate a fluid, less structured new program committee. It meets rarely, does little with the information gathered, and the source of information is seen as an informal, low-status individual. In addition, there is little money allocated for a library fund. Thus adoptiveness-innovativeness is associated with innovative

superintendents who come from within the hospital system, and with new program sources which are informal, low status and generally not rigidly structured.

The positive information gathering variables which were hypothesized to be associated with diffusion, are in fact associated with stability. Positive information gathering variables such as more funds for workshops and travel, and a larger new program committee, are associated with variables which describe a stable, established hospital; few crises, satisfaction with programs, little turnover of staff and generally a great amount of influence for the middle disciplines. The new program subunit (hypothesis 1) is a sign not of innovativeness, but stability.

It seems that once such a committee is established and part of the hospital's status quo, it reinforces the stability which that hospital may have gained. New programs may be looked at by such committees, but new programs do not appear in that hospital. The committee may relieve the hospital of the responsibility for actually implementing new, innovative programs. Innovative programming occurs in those hospitals which place new program responsibility in less well-established hands.

A stable hospital is not threatened by a committee looking for new programs, but it will also not change and will not be associated with general innovativeness. In our 25 volunteers, stability is not associated with

diffusion of a specific innovation nor general innovativeness. On the other hand, diffusion is not directly associated with a crisis-orientation as proposed by Schon (1967).

### Interpretations and Conclusions

#### Limitations

As is typically the case in non-laboratory research, the most serious deficiencies of the present study involve variables uncontrollable by the research team. The most serious limitation in terms of hypothesis-testing lies in the lack of diffusion of our innovation. Although this is in itself an important finding, it creates difficulty for any hypothesis-testing as mentioned earlier. It is difficult to test hypotheses about an event which only rarely occurs.

To use Rogers' (1971) terms, our innovation lacks relative advantage, is too complex, incompatible, unobservable or untriable to be adopted by a majority of our population. Another test of diffusion which involved a more easily spread innovation might have given us further insight into the diffusion process. Our findings can only apply to complex programs like the lodge.

Other limitations involve measurement and research design. Ideally we would have employed face-to-face

interviews, site visits, direct measurement of innovative programs, and the like. But time and resource limitations precluded the ideal.

In light of the number of personnel changes which we found, and the fluid nature of many of the institutions interviewed, tracing down our preferred respondents was also difficult. Our hierarchy of preferred respondents may not be ideal, and arguments could be made for other choices. After extensive discussion with the entire research team, the present hierarchy was chosen. The fact that neither status of respondent nor past involvement of respondent appeared as important variables, lends some confirmation to the validity of our decision.

A somewhat more serious limitation, which has been discussed previously, involves the role of our interviewers. One interviewer did evoke significantly different responses on some questions than the other two. It is unlikely that further training would have eliminated this bias. Rather, it appears that such differences were due to the personality of that one interviewer. The fact that his influence was essentially inconsequential to the cluster analysis, allows more confidence in our findings. We suggest, however, that such a variable be carefully controlled in future diffusion studies.



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Finally, the question of sample size deserves brief discussion. Considering the fact that we have employed virtually the entire population of State and V.A. mental hospitals, this should not be a concern. But, the most significant associative findings are in the implementation volunteer hospitals, where the N size is only 25. Our results for the other 219 hospitals are not limited by this concern, but N size must be considered in any interpretation of the volunteer hospitals.

The limitations discussed above must be recognized in any interpretation of the results of the study. However, the results obtained cannot be discounted or ignored because of these limitations.

#### Planned and Unplanned Diffusion

Much of the theoretical background for the present study is based upon the work of Rogers (1962, 1971) and Havelock (1971). Rogers' conceptualization of the social interaction model is founded in large part on examples of unplanned diffusion. We must recognize, however, that there are important differences between adoption of agricultural implements, prescription drugs, or contraceptives and the adoption of a complex, social system change, such as the lodge. For one, lodge adoption involves role changes inconsistent with past

behavior. Adopters are not merely accepting a better way to grow corn, but rather a new life style for themselves and their clients.

In addition, an important element of Rogers' model is the interaction which exists between social system elements. Such interaction will occur in a small Iowa community; but we have studied a population without such effective communication channels. It is a large system which encourages only infrequent communication between elements. As we will show in the next section, the communication which does occur even in the best circumstances is haphazard and leads to little more than discussion of the concept.

Therefore, the lack of unplanned diffusion of the lodge concept must be examined in the light of such limitations. The fact that some diffusion did occur in those hospitals where active implementation attempts were made is further evidence of the importance of planning any innovation attempt. Future research should investigate the best methods for planning such diffusion, just as Fairweather, Sanders and Tornatzky, (1972) have done in the hospital implementation study.

An encouraging aspect of the present study was the unplanned dissemination of lodge information which emanated from at least one of the volunteer hospitals. As a direct consequence of implementing the lodge,

several members of this hospital's planning group continued to spread the lodge concept throughout their home state. They presented the information to state psychological, social work, and vocational rehabilitation meetings. A psychologist visited other state hospitals and even brought staff members from those hospitals to the lodge. The mean diffusion score for this state is 4.3, far above the national average.

This hospital suggests the value of a "diffusion center." Information about that center's innovation can easily be spread. The innovators can capitalize on the ease with which such local centers can spread information. But, as we can see, although information is spread, actual adoption is not necessarily forthcoming. Such diffusion centers would have to add an active, implementation attempt to get outstate hospitals to go beyond mere discussion.

### Future Research

Several possibilities for future research have been mentioned. The present study raises some interesting methodological questions which could be answered by future research. Basically, these revolve around the question of finding the most effective means of gathering diffusion data from a national sample. One could compare phone vs. written techniques, superintendent

vs. "other" respondents and perhaps attempt to gather more behavioral measures of diffusion. It would also seem beneficial to build diffusion information directly into the implementation part of experimental social innovative research. More accurate information would be available if it were gathered during the actual diffusion period, rather than depending upon recall.

Questions surrounding the type of innovation investigated might also be forwarded. As in Carlson's (1965) study of educational change, categorizing innovations by Rogers' (1971) criteria of relative advantage, complexity, trialability, observability and compatibility would be helpful. In this way one could compare important variables in both complex and simple changes.

The importance of the active change agent has been further highlighted in this study. The diffusion which occurred, occurred in those hospitals which had become active in the change process; and diffusion did not occur in those hospitals untouched by planned change attempts. Further research must be done to investigate the role of the change agent, and in particular, the possibility of an adopting institution becoming a diffusion center. A diffusion study could be developed to evaluate the effectiveness and feasibility of creating such centers. A major research effort should be designed

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to compare different methods for utilizing such centers. These could be statewide or regional. They could be responsible for spreading an innovation which they have adopted.

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## APPENDICES

## APPENDIX A

## Phone Questionnaire Introduction

"Hello. I'm Dr. \_\_\_\_\_ and I am a colleague of Dr. George W. Fairweather at Michigan State University. Dr. Fairweather and (previous research contact) have been involved for a number of years in research supported by NIMH research grants. Our present research is concerned with information which you might have about the mental health programs in your hospital. We are hoping to gain some insight into programs which hospitals find work for them.

I would like to ask you some questions about your programs and also about your hospital in general. All information will be kept confidential and we will not use your hospital's name in any way. It will only take 15-20 minutes, and will help us a great deal. Could you help me?" Yes \_\_\_\_ No \_\_\_\_.

IF "NO" ASK:

"Could you suggest someone who might be able to help us?" \_\_\_\_\_

(Ask 1st contact to switch you to operator and ask for 2nd person on list. Continue down list until a "Yes." If the last attempt also says "No," try person suggested above.

IF "YES," continue questionnaire.

## APPENDIX B

Questionnaire Items Used to Measure Degree  
of Adoption of the Community Lodge (Diffu)

1. Knowledge

- a. Have you heard of the Fairweather Community Lodge Program for schizophrenics?

IF "YES," read the following statement and go to question b. IF "NO," read following statement and ask if the respondent now remembers having heard of the lodge. If a second "NO," go to hypothesis-testing questions.

In (month, year) our research team contacted you about such a program. Subsequently, your hospital was contacted by (implementation consultant). We later inquired whether or not you would like to set up the Community Lodge Program for (name of hospital). That was in (month, year) and your hospital did (not) want to set up such a program.

- b. Please describe the lodge program as you remember it?

2. Persuasion

We are now interested in your hospital's subsequent reaction to the community lodge program information which you received. The following questions refer



specifically to the time after we last contacted you for a decision, that is, after (month, year).

- a. Did anyone in the hospital attempt to get more information about the lodge?
- b. Are you aware of any discussion about the lodge program which has occurred since (implementation decision date)?

IF "YES," TO b., GO TO c.

- c. How many such discussions were there?
- d. Who was discussing it? Number of people? Which disciplines?
- e. In what context were they discussing it?

### 3. Decision

- a. Was a formal decision made about adopting the lodge program since the (implementation decision date)?
- b. What was that decision?
- c. Who had the greatest amount of influence in that decision?
- d. What action was taken subsequent to that decision?

### 4. Confirmation (Action-adoption)

- a. Did the lodge program become a part of your hospital's activities?
- b. Please describe the operation of the lodge fully.
- c. When did it begin operating?

- d. Is it still in operation? If, "NO," When did it discontinue? Why was it discontinued?
- e. Have more than one lodge begun? How many?
- f. Was information about the lodge requested by others outside of your hospital?
- g. Have you or any of the staff sent information to others about the lodge program? Please describe.

## APPENDIX C

## Questionnaire Items Used to Measure Hypotheses

1. Specialized subunit for seeking new program information.

- a. Is there a group or individual whose function is to look for mental health treatment programs new to your hospital?

IF INDIVIDUAL

- b. What is his status?
- c. What percent of his time is spent in this function?
- d. What does he do with the information he gets?

IF GROUP

- e. What is the status of the head of that group?
- f. What percent of their time do most members of the committee spend in this function?
- g. How many people are there on that committee?
- h. Which disciplines are represented?
- i. How often does the committee meet?
- j. What do they do with the information they get?
- k. Is there anyone who is an informal contact for new programs?
  1. IF "YES," what is his status?

2. Goals of the hospital emphasize seeking new program information.

- a. Is reporting and receiving information about new programs a goal of your hospital?
- b. Do staff members of your hospital present their new programs to others in your hospital, as at workshops, in-hospital training, etc.?

c. Are hospital funds available for any of the following activities?

- (1) a library fund?
- (2) travel funds to attend workshops and conventions?
- (3) rewards to personnel for new program ideas?
- (4) in-hospital workshops for visiting professionals?

d. What is given weight in evaluating you by your superiors? This was measured by the following five-point scale items:

- How important is
- (1) administrative ability
  - (2) ability to do therapy
  - (3) research ability
  - (4) supervision of subordinates
  - (5) attending meetings
  - (6) innovative ideas of treatment
  - (7) ability to get patients out of the hospital
  - (8) ability to get along with co-workers

Item 6. was the key item. In order to place its importance in perspective, this variable was scored by giving one point for each item that number 6. was more important than and one-half point for ties. The higher the resulting score, the more important innovative ideas are in the respondent's evaluation as compared to other activities.

### 3. Change in leadership

- a. Have any new administrators joined your hospital since our last contact?
- b. How many? What positions? What date?
- c. When did the present superintendent of your hospital become superintendent?
- c. Did the present superintendent come from within the hospital's personnel or from outside the hospital?

### 4. Crisis situation

- a. Has any kind of major crisis occurred in your hospital since we last contacted you?

IF YES

- b. Please describe. How many such crises?
- c. When did that occur?
- d. How well was that crisis resolved?  
(5 point scale)
- e. Was there a great change in the hospital's functioning due to the crisis?  
(5 point scale)

5. Pattern of influence in decision-making about new programs.

- a. In general, how much say or influence do you feel each of the following units has on development of new treatment programs? Please rate from one to five with one being "no influence," and five being "a very great deal of influence."

| Amount of influence | Unit           | Initiate | Approve | Implement | Resist |
|---------------------|----------------|----------|---------|-----------|--------|
| _____               | a. Supt.       | _____    | _____   | _____     | _____  |
| _____               | b. Psychology  | _____    | _____   | _____     | _____  |
| _____               | c. Nursing     | _____    | _____   | _____     | _____  |
| _____               | d. Voc. Rehab. | _____    | _____   | _____     | _____  |
| _____               | e. Social Work | _____    | _____   | _____     | _____  |
| _____               | f. Psychiatry  | _____    | _____   | _____     | _____  |

For each of the above groups, please give me the following information? Is the influence of the (read unit names, changing order each time) in terms of which of the following? Do these units initiate new programs, approve new programs, implement new programs or generally resist new programs? (Check \_\_\_ above)

In order to measure "breadth of influence," a score was developed which simply counted the number of areas of influence checked by the respondent. "Total" influence was calculated by multiplying amount of influence and number of areas of influence together for each discipline.

- b. Please describe the superintendent's role in your hospital.

#### 6. Pride

- a. We need to obtain a subjective assessment of your treatment facilities as they relate to other mental hospitals in the country. Equating 100% to the best facility we would like you to indicate what percent of this optimal performance you personally feel your hospital is achieving?

0-20% 1      21-40% 2      41-60% 3      61-80% 4      81-100% 5

- b. How much better do you feel your programs should be?  
(5 point scale)

#### 7. Change orientation

- a. How does your hospital generally feel about starting new programs? (5 point scale)
- b. Do you know of any programs which have been approved by the hospital, but not implemented in the last 5 years? How many?
- c. Do you know of any programs which have been discontinued in the last five years? How many?

#### 8. Systemic perspective

This variable was measured by the responses to the following 5-point scale items.

To what extent are the following concerns expressed by leadership of your hospital?

- (1) relationship of hospital to local community
- (2) search for the optimal answer to mental health care
- (3) evaluation of present services
- (4) responding to community needs
- (5) active search for new programs

## APPENDIX D

## Diffusion-Adoption Stages

(Diffu)

- |              |                                                                                                                                                                                                                                                                                                                                                                                                                                                        |
|--------------|--------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| Knowledge    | 1...Never heard of the lodge, even though they may have heard of Fairweather's name. <u>Can describe nothing about the lodge.</u>                                                                                                                                                                                                                                                                                                                      |
|              | 2...Heard of the lodge and can describe it, even superficially; no subsequent discussion in or out of the hospital.                                                                                                                                                                                                                                                                                                                                    |
| Persuasion   | 3...Knows of minimal discussion about the lodge since our last contact. Evidence that less than five persons have discussed the lodge.                                                                                                                                                                                                                                                                                                                 |
|              | 4...Great deal of discussion in the hospital since our last contact, either informal or formal. 5 or more persons involved in discussions, greater than 10 discussions about it.                                                                                                                                                                                                                                                                       |
| Decision     | 5...Decision since our visit or last phone contact. Either lodge turned down or no decision arrived at, though brought before appropriate persons. Decision on ward program only if it is specifically intended to be pre-lodge.                                                                                                                                                                                                                       |
|              | 6...Lodge (or pre-lodge ward) decision was yes, regardless of subsequent action. Little or no action towards lodge set-up, though there may have been some further discussion.                                                                                                                                                                                                                                                                         |
| Confirmation | 7...Pre-lodge ward or "semi-lodge" set up with intention of moving to full lodge. If ward set up, but using for purposes other than to feed lodge, score a 6. "Semi-lodge" must be based on the lodge sources, and may include 1/4 way house if it is basically a lodge on the grounds, or a lodge off the grounds with staff contact and direction greater than in lodge prototype. Action is based on hospital's knowledge of the Fairweather lodge. |

8...Lodge set up on the lines of the Palo Alto model, particularly regarding no live-in staff, and some degree of work in the lodge. Must have functioned for 6 mos. or still be in operation. If discontinued after less than 6 months, give it a 7. If no work, give it a 7.

note: A hospital is to be scored on the highest level reached during the time period from implementation decision date to the present contact. For example, if the respondent can describe the lodge at the present time, and no other activity about the lodge occurred during the time period, then the hospital would receive a 2. If the contact claims he once knew what the lodge was, but cannot now describe it, the hospital would receive a 1. Persuasion, decision and confirmation activity described must have occurred during the proper time period.

#### Diffusion Score for 25 Volunteer Hospitals

(Diffu 2)

- 1...No additional discussion about movement towards the lodge.
- 2...Some discussion of lodge development, continuation of action started with researcher's help, but no new action.
- 3...Actual new action towards development of the lodge.



For those hospitals in the middle of adopting a first lodge at the last contact this is a measure of further progress. For those hospitals which had adopted a lodge by the last contact this is a measure of progress towards adoption of a second lodge. In both cases, it is again, movement towards adoption of a lodge since our last contact. In addition, Diffu is recorded for the volunteer hospitals. As a measure of progress towards adoption it is confounded with implementation attempts and is essentially a change score, but not a diffusion score.

## APPENDIX E

## Community-locus Score

definition: Community involvement of the hospital in the treatment of its patients. How much is the hospital willing to involve itself in community experience of patients or ex-patients.

- 1...Totally in-hospital orientation with no concern for patients community experience.
- 2...Simulation of community experience in the hospital. Training for community living without entering the community in a living or work situation, and without formal arrangement with community employer. In-hospital workshop included here, for in-patients. Include family therapy in hospital.
- 3...Helps patient in his community experience without structuring that experience. Includes follow-up, after care in which staff is available for follow-up, but concerned little with the structure of the patient's total community experience. Includes day hospital, since assumption is that the hospital experience is necessary for community adjustment, though the hospital does not attempt to help with actual life of the patient in the community. Formal relationship for feeding patients to community services.
- 4...Structures some of patient's time in the community, trains community living in the community, patient spends most of his waking time in the community. Sheltered workshop in the community or 1/4 way house with work in the community.
- 5...Hospital takes responsibility for patient's time in the community and structures that time in the community. All of the patient's time in the community situation which is run by the hospital, or that the hospital takes responsibility for (1/2 way house, boarding house, foster care, if directly the responsibility of the hospital).

## APPENDIX F

## Autonomy Score

- 1...Staff living with, or attendant to patients at all times. Patient's "home" supervised by staff or pseudo-staff (foster care parents, 1/2 way house mothers). Includes traditional wards, with full time staff.
- 2...Staff available basically as consultants, but on a daily basis. Staff does not supervise all activities of patients, but rather give patient some responsibility for making his own decisions as with patient self-government. Includes day care - daily contact without staff living with patient. Waking hours include both supervision and experience in peer run situation. Day hours may include supervision while night is free of staff intervention, or vice versa.
- 3...Staff available only on an infrequent and probably irregular basis. No staff actually living with patient, peer-run situation; living at home or alone with follow-up program. Living situation does not include staff members being present at all times; 1/4 or 1/2 way house without live-in staff, no staff attendant during day or night hours.

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